STIC Search Report
Biotech-Chem Library

STIC Database Tracking Number: 139486

To: Sarvamangala Devi **Location:** REM 3C18 **Art Unit:** 1645 Monday, December 06, 2004 **Case Serial Number:** 10/081170	**From:** Beverly Shears **Location:** Remsen Bldg. RM 1A54 **Phone:** 571-272-2528 beverly.shears@uspto.gov

Search Notes

Shears, Beverly

From: Devi, Sarvamangala
Sent: Friday, November 19, 2004 7:31 AM
To: Shears, Beverly
Subject: 10/081,170

Beverly:

Please perform a text search for the following claims in application 10/081,170:

1. An isolated mutant cell comprising decreased levels of sialic acid-containing host cell receptors for influenza virus relative to a corresponding wild-type cell which wild-type cell supports efficient influenza virus replication, wherein the mutant cell is selected for resistance to growth inhibition by a lectin which binds terminal sialic acid residues in sialic acid-containing molecules.
2. The isolated mutant cell of claim 1 which is a mammalian cell.
3. The isolated mutant cell of claim 2 which is a swine, bovine, simian or canine cell.
4. The isolated mutant cell of claim 1 wherein the wild-type cell is a Madin-Darby canine kidney (MDCK) cell.
5. The isolated mutant cell of claim 2 which is a mink cell.
6. The isolated mutant cell of claim 5 which is a mink lung cell.
7. The isolated mutant cell of claim 1 which is an avian cell.
8. The isolated mutant cell of claim 1 which has decreased levels of N-acetylneuraminic acid (NANA or NeuNAc).
9. The isolated mutant cell of claim 1 which has decreased levels of N-glycolylneuraminic acid.

Thanx.

S. DEVI, Ph.D.

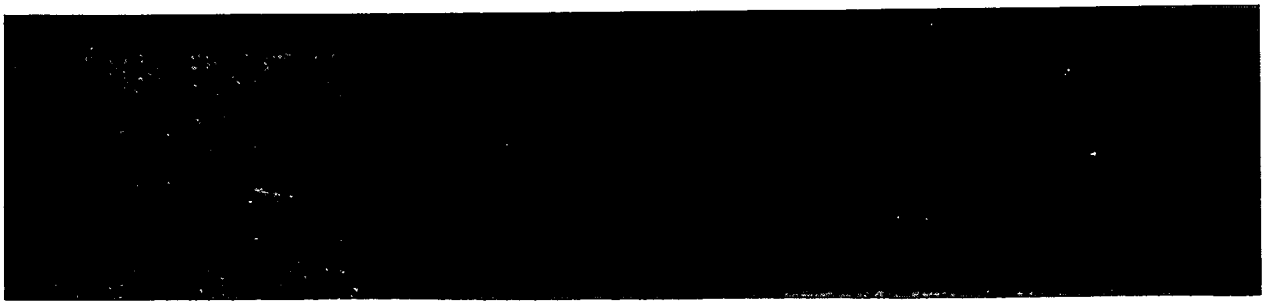
Date completed: _____
Searcher: Beverly e 2528
Terminal time: _____
Elapsed time: _____
CPU time: _____
Total time: _____
Number of Searches: _____
Number of Databases: _____

Search Site
_____ STIC
_____ CM-1
_____ Pre-S

Type of Search
_____ N.A. Sequence
_____ A.A. Sequence
_____ Structure
_____ Bibliographic

Vendors
_____ IG
✓ STN
✓ Dialog
_____ APS
_____ Geninfo
_____ SDC
_____ DARC/Questel
_____ Other

PTO-1590 (9-90)



Devi, S.
10/081170


```
     FILE 'REGISTRY' ENTERED AT 10:35:54 ON 06 DEC 2004
                E SIALIC ACID/CN 5
                E "N-ACETYLNEURAMINIC ACID"/CN 5
L1            1 S E3
                E "N-GLYCOLYLNEURAMINIC ACID"/CN 5
L2            1 S E3
L3            2 S L1 OR L2
                E LECTIN/CN 5
L4          609 S LECTIN ?/CN

     FILE 'CAPLUS' ENTERED AT 10:38:01 ON 06 DEC 2004
L1            1 SEA FILE=REGISTRY ABB=ON  PLU=ON  "N-ACETYLNEURAMINIC ACID"/CN

L2            1 SEA FILE=REGISTRY ABB=ON  PLU=ON  "N-GLYCOLYLNEURAMINIC
                ACID"/CN
L3            2 SEA FILE=REGISTRY ABB=ON  PLU=ON  L1 OR L2
L4          609 SEA FILE=REGISTRY ABB=ON  PLU=ON  LECTIN ?/CN
L5        24217 SEA FILE=CAPLUS ABB=ON  PLU=ON  L3 OR SIALIC OR ACETYLNEURAMINI
                C OR ACETYLSIALIC OR GLYCOLYLNEURAMINIC OR GLYCOLOYLNEURAMINIC
                OR (AC OR ACETYL OR GLYCOLOYL OR GLYCOLYL)(1W)NEURAMINIC OR
                NEUNAC OR NEU NAC OR NANA OR GCNEU OR GC NEU OR NGNA
L6          931 SEA FILE=CAPLUS ABB=ON  PLU=ON  L5 AND (INFLUENZA? OR ORTHOMYXO
                (W)(VIRID? OR VIRUS?) OR ORTHOMYXOVIR? OR MYXOVIR?)
L7          104 SEA FILE=CAPLUS ABB=ON  PLU=ON  L6 AND (MUTAT? OR MUTANT OR
                MUTAGEN? OR POLYMORPH? OR POLY MORPH?)
L8           29 SEA FILE=CAPLUS ABB=ON  PLU=ON  L7 AND (L4 OR LECTIN)
L9           11 SEA FILE=CAPLUS ABB=ON  PLU=ON  L8 AND (AVES OR AVIAN OR BIRD
                OR ANIMAL OR MAMMAL? OR MINK OR MDCK OR MADIN DARBY? OR VISON
                OR LUTREOLA OR MACRODON OR WILD TYPE# OR SWINE OR PIG OR HOG
                OR BOVINE OR CATTLE OR COW OR PORCINE OR SIMIAN OR MONKEY OR
                APE OR CHIMP OR CHIMPANZ? OR CANINE OR DOG)(S)CELL

L9   ANSWER 1 OF 11  CAPLUS  COPYRIGHT 2004 ACS on STN
ED   Entered STN:  04 May 2004
ACCESSION NUMBER:          2004:361935  CAPLUS
DOCUMENT NUMBER:           140:417334
TITLE:                     Changes in in vitro susceptibility of
                           influenza A H3N2 viruses to a neuraminidase
                           inhibitor drug during evolution in the human host
AUTHOR(S):                 Thompson, Catherine I.; Barclay, Wendy S.; Zambon,
                           Maria C.
CORPORATE SOURCE:          School of Animal and Microbial Sciences, University of
                           Reading, Reading, RG6 6AJ, UK
SOURCE:                    Journal of Antimicrobial Chemotherapy (2004), 53(5),
                           759-765
                           CODEN: JACHDX; ISSN: 0305-7453
PUBLISHER:                 Oxford University Press
DOCUMENT TYPE:             Journal
LANGUAGE:                  English
AB   Influenza A H3N2 viruses isolated recently have characteristic
     receptor binding properties that may decrease susceptibility to
     neuraminidase inhibitor drugs.  A panel of clin. isolates and recombinant
     viruses generated by reverse genetics were characterized and tested for
     susceptibility to zanamivir.  Plaque reduction assays and neuraminidase
enzyme
     inhibition assays were used to assess susceptibility to zanamivir.
```

Searcher : Shears 571-272-2528

Receptor binding properties of the viruses were characterized by differential agglutination of red blood cells (RBCs) from different species. Sequence anal. of the hemagglutinin (HA) and neuraminidase (NA) genes was carried out. Characterization of a panel of H3N2 clin. isolates from 1968 to 2000 showed a gradual decrease in agglutination of chicken and guinea pig RBCs over time, although all isolates could agglutinate turkey RBCs equally. Sequence anal. of the HA and NA genes identified **mutations** in conserved residues of the HA1 receptor binding site, in particular Leu-226 → Ile-226/Val-226, and modification of potential glycosylation site motifs. This may be indicative of changes in virus binding to **sialic** acid (SA) receptors in recent years. Although recent isolates had reduced susceptibility to zanamivir in **MDCK cell** based plaque reduction assays, no difference was found in an NA enzyme-inhibition assay. Assays with recombinant isogenic viruses showed that the recent HA, but not the NA, conferred reduced susceptibility to zanamivir. This study demonstrates that recent clin. isolates of **influenza** A H3N2 virus no longer agglutinate chicken RBCs, but despite significant receptor binding changes as a result of changes in HA, there was little variation in sensitivity of the NA to zanamivir.

REFERENCE COUNT: 39 THERE ARE 39 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 2 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 10 Dec 2002
ACCESSION NUMBER: 2002:937303 CAPLUS
DOCUMENT NUMBER: 138:20443
TITLE: Endocrine disruptor screening using DNA chips of endocrine disruptor-responsive genes
INVENTOR(S): Kondo, Akihiro; Takeda, Takeshi; Mizutani, Shigetoshi; Tsujimoto, Yoshimasa; Takashima, Ryokichi; Enoki, Yuki; Kato, Ikunoshin
PATENT ASSIGNEE(S): Takara Bio Inc., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 386 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
JP 2002355079	A2	20021210	JP 2002-69354		20020313
PRIORITY APPLN. INFO.:			JP 2001-73183	A	20010314
			JP 2001-74993	A	20010315
			JP 2001-102519	A	20010330

AB A method and kit for detecting endocrine-disrupting chems. using DNA microarrays are claimed. The method comprises preparing a nucleic acid sample containing mRNAs or cDNAs originating in cells, tissues, or organisms which have been brought into contact with a sample containing the endocrine disruptor. The nucleic acid sample is hybridized with DNA microarrays having genes affected by the endocrine disruptor or DNA fragments originating in these genes have been fixed. The results obtained are then compared with the results obtained with the control sample to select the gene affected by the endocrine disruptor. Genes whose expression is altered by tri-Bu tin, 4-octaphenol, 4-nonylphenol, di-N-Bu phthalate,

dichlorohexyl phthalate, octachlorostyrene, benzophenone, diethylhexyl phthalate, diethylstilbestrol (DES), and 17-β estradiol (E2), were found in mice by DNA chip anal.

L9 ANSWER 3 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 29 Nov 2002
ACCESSION NUMBER: 2002:907161 CAPLUS
DOCUMENT NUMBER: 138:13500
TITLE: Superantigen-glycolipid conjugates loaded onto antigen presening cells for adoptive immunotherapy of neoplastic and infectious diseases
INVENTOR(S): Terman, David S.
PATENT ASSIGNEE(S): USA
SOURCE: U.S. Pat. Appl. Publ., 167 pp.
CODEN: USXXCO
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
US 2002177551	A1	20021128	US 2001-870759		20010530
PRIORITY APPLN. INFO.:			US 2000-208128P	P	20000531

AB The present invention comprises compns. and methods for treating a tumor or neoplastic disease in a host, The methods employ conjugates comprising superantigen polypeptides, nucleic acids with other structures that preferentially bind to tumor cells and are capable of inducing apoptosis. Also provided are superantigen-glycolipid conjugates and vesicles that are loaded onto antigen presenting cells to activate both T cells and NKT cells. **Cell**-based vaccines comprise tumor **cells** engineered to express a superantigen along with glycolipids products which, when expressed, render the **cells** capable of eliciting an effective anti-tumor immune response in a **mammal** into which these **cells** are introduced. Included among these compns. are tumor cells, hybrid cells of tumor cells and accessory cells, preferably dendritic cells. Also provided are tumoricidal T cells and NKT cells devoid of inhibitory receptors or inhibitory signaling motifs which are hyperresponsive to the the above compns. and lipid-based tumor associated antigens that can be administered for adoptive immunotherapy of cancer and infectious diseases.

L9 ANSWER 4 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 08 Sep 2002
ACCESSION NUMBER: 2002:676181 CAPLUS
DOCUMENT NUMBER: 137:214224
TITLE: Identification of **lectin**-resistant **animal cells** with reduced **sialic** acid for **influenza** virus **mutant** capable of replicating in an altered host **cell**
INVENTOR(S): Kawaoka, Yoshihiro
PATENT ASSIGNEE(S): Wisconsin Alumni Research Foundation, USA
SOURCE: PCT Int. Appl., 33 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent

LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002068632	A2	20020906	WO 2002-US5455	20020222
WO 2002068632	A3	20030530		
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
US 2002197705	A1	20021226	US 2002-81170	20020222
EP 1364006	A2	20031126	EP 2002-724994	20020222
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				

PRIORITY APPLN. INFO.: US 2001-271044P P 20010223
WO 2002-US5455 W 20020222

AB The invention provides an isolated **mutant** vertebrate cell which has altered expression of **sialic** acid for **influenza** virus, and methods of preparing and using the **mutant** cell. The invention provides cells useful to propagate **influenza** virus **mutants** having reduced sialidase activity caused by deletion **mutation** in NA gene. To produce cell lines with a decreased level of **sialic** acid expression on the cell surface, two **lectins** were used, SNA and MAA, to treat the cells. The **MDCK cell** line, which supports the growth of **influenza** viruses, was used as a parent **cell** for **lectin** selection. Viruses lacking sialidase activity can grow efficiently in cells expressing a reduced level of **sialic** acid because the viral glycoproteins are not sialylated extensively compared with those in normal cell lines and are not bound by the HA (hemagglutinin), thus preventing viral aggregation.

IT **131-48-6**, N-**Acetylneuraminic** acid **1113-83-3**, N-**Glycolylneuraminic** acid
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(identification of **lectin**-resistant **animal cells** with reduced **sialic** acid for **influenza** virus **mutant** capable of replicating in an altered host **cell**)

L9 ANSWER 5 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 30 May 2002
ACCESSION NUMBER: 2002:404543 CAPLUS
DOCUMENT NUMBER: 137:31962
TITLE: Role of phosphatidylserine exposure and sugar chain desialylation at the surface of **influenza** virus-infected cells in efficient phagocytosis by macrophages
AUTHOR(S): Watanabe, Yuichi; Shiratsuchi, Akiko; Shimizu,

Kazufumi; Takizawa, Takenori; Nakanishi, Yoshinobu
CORPORATE SOURCE: Graduate School of Medical Science, Kanazawa University, Ishikawa, 920-0934, Japan
SOURCE: Journal of Biological Chemistry (2002), 277(20), 18222-18228
CODEN: JBCHA3; ISSN: 0021-9258
PUBLISHER: American Society for Biochemistry and Molecular Biology
DOCUMENT TYPE: Journal
LANGUAGE: English

AB HeLa cells infected with **influenza** A virus undergo typical caspase-dependent apoptosis and are efficiently phagocytosed by mouse peritoneal macrophages in a manner mediated by the membrane phospholipid phosphatidylserine, which is translocated to the surface of virus-infected cells during apoptosis. However, the extent of phagocytosis is not always parallel with the level of phosphatidylserine externalization. Here we examined the involvement of **influenza** virus neuraminidase (NA) in efficient phagocytosis of virus-infected cells. HeLa **cells** infected with an **influenza** virus strain expressing temperature-sensitive NA underwent apoptosis and produced viral proteins, including the defective NA, at a non-permissive temperature to almost the same extent as **cells** infected with the **wild-type** virus. The cells were, however, phagocytosed by macrophages with reduced efficiency. In addition, phagocytosis of **cells** infected with the **wild-type** virus was severely inhibited when the **cells** had been maintained in the presence of the NA inhibitor zanamivir. On the other hand, the binding of **sialic** acid-recognizing **lectins** to the **cell** surface declined after infection with the **wild-type** virus. The decrease in the extent of **lectin** binding was greatly attenuated when **cells** were infected with the **mutant** virus or when **wild-type** virus-infected **cells** were maintained in the presence of zanamivir. These results indicate that sugar chains are desialylated by NA at the surface of virus-infected cells. We conclude that the presence of both phosphatidylserine and asialoglyco-moieties on the cell surface is required for efficient phagocytosis of **influenza** virus-infected cells by macrophages.

REFERENCE COUNT: 49 THERE ARE 49 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 6 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 05 Apr 2001
ACCESSION NUMBER: 2001:240511 CAPLUS
DOCUMENT NUMBER: 135:18442
TITLE: Adaptation of **influenza** A viruses to cells expressing low levels of **sialic** acid leads to loss of neuraminidase activity
AUTHOR(S): Hughes, Mark T.; McGregor, Martha; Suzuki, Takashi; Suzuki, Yasuo; Kawaoka, Yoshihiro
CORPORATE SOURCE: Department of Pathobiological Sciences, School of Veterinary Medicine, University of Wisconsin-Madison, Madison, WI, 53706, USA
SOURCE: Journal of Virology (2001), 75(8), 3766-3770
CODEN: JOVIAM; ISSN: 0022-538X
PUBLISHER: American Society for Microbiology

DOCUMENT TYPE: Journal
LANGUAGE: English
AB **Influenza** A viruses possess two virion surface proteins, hemagglutinin (HA) and neuraminidase (NA). The HA binds to sialyloligosaccharide viral receptors, while the NA removes **sialic** acids from the host cell and viral sialyloligosaccharides. Alterations of the HA occur during adaptation of **influenza** viruses to new host species, as in the 1957 and 1968 **influenza** pandemics. To gain a better understanding of the contributions of the HA and possibly the NA to this process, we generated **cell** lines expressing reduced levels of the **influenza** virus receptor determinant, **sialic** acid, by selecting **Madin-Darby canine** kidney **cells** resistant to a **lectin** specific for **sialic** acid linked to galactose by α(2-3) or α(2-6) linkages. One of these cell lines had less than 1/10 as much N-**acetylneuraminic** acid as its parent cell line. When serially passaged in this cell line, human H3N2 viruses lost sialidase activity due to a large internal deletion in the NA gene, without alteration of the HA gene. These findings indicate that NA **mutations** can contribute to the adaptation of **influenza** A virus to new host environments and hence may play a role in the transmission of virus across species.
REFERENCE COUNT: 29 THERE ARE 29 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 7 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 07 Jun 1999
ACCESSION NUMBER: 1999:344861 CAPLUS
DOCUMENT NUMBER: 131:4240
TITLE: Immunoglobulin molecules having a synthetic variable region and modified specificity
INVENTOR(S): Burch, Ronald M.
PATENT ASSIGNEE(S): Euro-Celtique, S.A., Bermuda
SOURCE: PCT Int. Appl., 123 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9925378	A1	19990527	WO 1998-US24302	19981113
W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
CA 2309990	AA	19990527	CA 1998-2309990	19981113
CA 2310269	AA	19990527	CA 1998-2310269	19981113
WO 9925379	A1	19990527	WO 1998-US24303	19981113
W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW,				

MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR,
TT, UA, UG, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES,
FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI,
CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

AU 9914597	A1	19990607	AU 1999-14597	19981113
AU 763029	B2	20030710		
AU 9914598	A1	19990607	AU 1999-14598	19981113
AU 737457	B2	20010823		
EP 1030684	A1	20000830	EP 1998-958584	19981113
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
EP 1032420	A1	20000906	EP 1998-958583	19981113
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
JP 2001526021	T2	20011218	JP 2000-520811	19981113
BR 9815289	A	20011226	BR 1998-15289	19981113
BR 9815580	A	20020129	BR 1998-15580	19981113
JP 2002507544	T2	20020312	JP 2000-520812	19981113
ZA 9900048	A	19990708	ZA 1999-48	19990105
ZA 9900049	A	20000309	ZA 1999-49	19990105
US 2002028469	A1	20020307	US 2001-963232	20010926
BR 2002012865	A	20040914	BR 2002-12865	20020828
PRIORITY APPLN. INFO.:			US 1997-65716P P	19971114
			US 1998-81403P P	19980410
			US 1998-191780 A1	19981113
			WO 1998-US24302 W	19981113
			WO 1998-US24303 W	19981113
			US 2001-963232 A	20010926
			WO 2002-US27446 W	20020828

AB The invention provides modified Ig mols., particularly antibodies, that immunospecifically bind a first member of a binding pair which binding pair consists of the first member and a second member, which Igs have a variable domain containing one or more complimentary determining regions that
contain the amino acid sequence of a binding site for the second member of the binding pair. The first member is a tumor antigen or an antigen of an infectious disease agent, and the second member is a mol. on the surface of an immune cell. The invention further provides for therapeutic and diagnostic use of the modified Ig.

REFERENCE COUNT: 13 THERE ARE 13 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 8 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 20 Mar 1997
ACCESSION NUMBER: 1997:185285 CAPLUS
DOCUMENT NUMBER: 126:274582
TITLE: Differences in **sialic** acid-galactose linkages in the chicken egg amnion and allantois influence human **influenza** virus receptor specificity and variant selection
AUTHOR(S): Ito, Toshihiro; Suzuki, Yasuo; Takada, Ayato; Kawamoto, Ayumi; Otsuki, Koichi; Masuda, Hiroyuki; Yamada, Mika; Suzuki, Takashi; Kida, Hiroshi; Kawaoka, Yoshihiro
CORPORATE SOURCE: Dep. Disease Control, Grad. Sch. Vet. Med., Sapporo,

060, Japan
SOURCE: Journal of Virology (1997), 71(4), 3357-3362
CODEN: JOVIAM; ISSN: 0022-538X
PUBLISHER: American Society for Microbiology
DOCUMENT TYPE: Journal
LANGUAGE: English

AB Human **influenza** viruses are more efficiently isolated by inoculating patient samples into the amniotic rather than the allantoic cavity of embryonated chicken eggs. This type of cultivation selects virus variants with **mutations** around the hemagglutinin (HA) receptor binding site. To understand the mol. basis of these phenomena, the abundances of **sialic** acid (SA) linked to galactose (Gal) by the α-2,3 linkage (SAα2,3Gal) and SAαa2,6Gal in egg amniotic and allantoic **cells** and in **Madin-Darby canine** kidney (**MDCK**) **cells** was investigated. Using SA-Gal linkage-specific **lectins** (Maackia amurensis agglutinin specific for SAα2,6Gal and Sambucus nigra agglutinin specific for SAα2,3Gal), SAα2,3Gal was found in both allantoic and amniotic cells and SAα2,6Gal in only the amniotic cells. **MDCK cells** contained both linkages. To investigate how this difference in abundances of SAα2,3Gal and SAα2,6Gal in allantoic and amniotic **cells** affects the appearance of host **cell** variants in eggs, the receptor specificities and HA amino acid sequences of 2 different patient viruses which were isolated and passaged in the amnion or in the allantois and were determined and compared with **MDCK cell**-grown viruses. The viruses maintained high SAα2,6Gal specificities when grown in **MDCK cells** or following ≤2 amniotic passages; however, further passages in either the amnion or allantois resulted in the acquisition of, or a complete shift to, SAα2,3Gal specificity, depending on the virus strain. This change in receptor specificity was accompanied by the appearance of variants in the population with Leu-to-Gln **mutations** at position 226 in their HA. These findings suggest that lack of SAα2,6Gal linkages in the allantois of chicken eggs is a selective pressure for the appearance of host cell variants with altered receptor specificities and amino acid changes at position 226.

REFERENCE COUNT: 35 THERE ARE 35 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 9 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 16 Sep 1990
ACCESSION NUMBER: 1990:495736 CAPLUS
DOCUMENT NUMBER: 113:95736
TITLE: **Mutation** in antigenicity of **influenza** virus hemagglutinin and neuraminidase glycoprotein, and mechanism of the sugar-chain containing **sialic** acid in cell membrane
AUTHOR(S): Suzuki, Yasuo; Matsumoto, Makoto
CORPORATE SOURCE: Fac. Pharm. Sci., Univ. Shizuoka, Shizuoka, 422, Japan
SOURCE: Ikagaku Oyo Kenkyu Zaidan Kenkyu Hokoku (1989), Volume Date 1988, 7, 171-6
CODEN: IOKHEP; ISSN: 0914-5117
DOCUMENT TYPE: Journal; General Review
LANGUAGE: Japanese

AB A review, with 15 refs., on the **mutation** of **influenza** virus hemagglutinin and neuraminidase, and mechanism of the recognition of sugar-chain containing **sialic** acid in cell membrane.

L9 ANSWER 10 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 19 Aug 1988
ACCESSION NUMBER: 1988:450425 CAPLUS
DOCUMENT NUMBER: 109:50425
TITLE: Structure of the **influenza** virus hemagglutinin complexed with its receptor, **sialic** acid
AUTHOR(S): Weis, W.; Brown, J. H.; Cusack, S.; Paulson, J. C.; Skehel, J. J.; Wiley, D. C.
CORPORATE SOURCE: Howard Hughes Med. Inst., Harvard Univ., Cambridge, MA, 02138, USA
SOURCE: Nature (London, United Kingdom) (1988), 333(6172), 426-31
CODEN: NATUAS; ISSN: 0028-0836
DOCUMENT TYPE: Journal
LANGUAGE: English
AB The 3-dimensional structures of **influenza** virus hemagglutinins complexed with cell receptor analogs show **sialic** acids bound to a pocket of conserved amino acids surrounded by antibody-binding sites. **Sialic** acid fills the conserved pocket, demonstrating that it is the **influenza** virus receptor. The proximity of the antibody-binding sites suggests that antibodies neutralize virus infectivity by preventing virus-to-cell binding. The structures suggest approaches to the design of anti-viral drugs that could block attachment of viruses to cells.

L9 ANSWER 11 OF 11 CAPLUS COPYRIGHT 2004 ACS on STN
ED Entered STN: 19 Apr 1986
ACCESSION NUMBER: 1986:123983 CAPLUS
DOCUMENT NUMBER: 104:123983
TITLE: Variant **influenza** virus hemagglutinin that induces fusion at elevated pH
AUTHOR(S): Doms, Robert W.; Gething, Mary Jane; Henneberry, Jean; White, Judy; Helenius, Ari
CORPORATE SOURCE: Sch. Med., Yale Univ., New Haven, CT, 06510, USA
SOURCE: Journal of Virology (1986), 57(2), 603-13
CODEN: JOVIAM; ISSN: 0022-538X
DOCUMENT TYPE: Journal
LANGUAGE: English
AB The hemagglutinin (HA) glycoprotein of **influenza** virus performs 2 critical roles during infection. It binds virus to cell surface **sialic** acids, and under mildly acid conditions, it induces fusion of the virion with intracellular membranes, liberating the genome into the cytoplasm. The pH dependence of fusion varies for different **influenza** virus strains. The isolation and characterization is described of a naturally occurring variant of the X31 strain that fuses at a pH 0.2 units higher than the parent strain does and that is less sensitive to the effects of ammonium chloride, a compound known to elevate endosomal pH. The bromelain-solubilized ectodomain of the variant HA displayed a corresponding shift in the pH at which it changed conformation and bound to liposomes. Cloning and sequencing of the variant HA gene revealed amino acid substitutions at 3 positions in the polypeptide. Two

substitutions were in antigenic determinants in the globular region of HA1, and the 3rd occurred in HA2 near the base of the mol. Chimeric HA mols. expressed in CV-1 cells from SV40 virus-based vectors were used to show that the change in HA2 was solely responsible for the altered fusion phenotype. This substitution, asparagine for aspartic acid at position 132, disrupted a highly conserved interchain salt bridge between adjacent HA2 subunits. The apparent role of this residue in stabilizing the HA trimer is consistent with the idea that the trimer dissocs. at low pH. Furthermore, the results demonstrate that **influenza** virus populations contain fusion variants, raising the possibility that such variants may play a role in the evolution of the virus.

L1 1 SEA FILE=REGISTRY ABB=ON PLU=ON "N-ACETYLNEURAMINIC ACID"/CN

L2 1 SEA FILE=REGISTRY ABB=ON PLU=ON "N-GLYCOLYLNEURAMINIC ACID"/CN

L3 2 SEA FILE=REGISTRY ABB=ON PLU=ON L1 OR L2

L4 609 SEA FILE=REGISTRY ABB=ON PLU=ON LECTIN ?/CN

L10 24217 SEA FILE=CAPLUS ABB=ON PLU=ON L3 OR SIALIC OR ACETYLNEURAMINIC OR ACETYLSIALIC OR GLYCOLYLNEURAMINIC OR GLYCOLOYLNEURAMINIC OR (AC OR ACETYL OR GLYCOLOYL OR GLYCOLYL)(1W)NEURAMINIC OR NEUNAC OR NEU NAC OR NANA OR GCNEU OR GC NEU OR NGNA OR SA(S)SIALIC

L11 931 SEA FILE=CAPLUS ABB=ON PLU=ON L10 AND (INFLUENZA? OR ORTHOMYXO(W)(VIRID? OR VIRUS?) OR ORTHOMYXOVIR? OR MYXOVIR?)

L12 104 SEA FILE=CAPLUS ABB=ON PLU=ON L11 AND (MUTAT? OR MUTANT OR MUTAGEN? OR POLYMORPH? OR POLY MORPH?)

L13 29 SEA FILE=CAPLUS ABB=ON PLU=ON L12 AND (L4 OR LECTIN)

L14 11 SEA FILE=CAPLUS ABB=ON PLU=ON L13 AND (AVES OR AVIAN OR BIRD OR ANIMAL OR MAMMAL? OR MINK OR MDCK OR MADIN DARBY? OR VISON OR LUTREOLA OR MACRODON OR WILD TYPE# OR SWINE OR PIG OR HOG OR BOVINE OR CATTLE OR COW OR PORCINE OR SIMIAN OR MONKEY OR APE OR CHIMP OR CHIMPANZ? OR CANINE OR DOG)(S)CELL

L15 0 L14 NOT L9

(FILE 'MEDLINE, BIOSIS, EMBASE, WPIDS, JICST-EPLUS, JAPIO, PHIC, PHIN, TOXCENTER, PASCAL, DISSABS, FEDRIP, VETU, VETB, CABA, AGRICOLA' ENTERED AT 10:43:32 ON 06 DEC 2004)

L16 18 S L14

L17 9 DUP REM L16 (9 DUPLICATES REMOVED)

L17 ANSWER 1 OF 9 WPIDS COPYRIGHT 2004 THE THOMSON CORP on STN

ACCESSION NUMBER: 2002-706991 [76] WPIDS

DOC. NO. CPI: C2002-200568

TITLE: New **mutant** cell for propagating **influenza** virus with decreased sialidase activity useful as vaccine, comprises decreased levels of **sialic** acid containing host cell receptors for **influenza** virus.

DERWENT CLASS: B04 C06 D16

INVENTOR(S): KAWAOKA, Y

PATENT ASSIGNEE(S): (KAWA-I) KAWAOKA Y; (WISC) WISCONSIN ALUMNI RES FOUND

COUNTRY COUNT: 101

PATENT INFORMATION:

PATENT NO	KIND	DATE	WEEK	LA	PG
WO 2002068632	A2	20020906	(200276)*	EN	33
RW: AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW MZ NL OA PT SD SE SL SZ TR TZ UG ZM ZW					
W: AE AG AL AM AT AU AZ BA BB BG BR BY BZ CA CH CN CO CR CU CZ DE DK DM DZ EC EE ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NO NZ OM PH PL PT RO RU SD SE SG SI SK SL TJ TM TN TR TT TZ UA UG US UZ VN YU ZA ZM ZW					
US 2002197705	A1	20021226	(200304)		
EP 1364006	A2	20031126	(200380)	EN	
R: AL AT BE CH CY DE DK ES FI FR GB GR IE IT LI LT LU LV MC MK NL PT RO SE SI TR					
AU 2002255590	A1	20020912	(200433)		

APPLICATION DETAILS:

PATENT NO	KIND	APPLICATION	DATE
WO 2002068632	A2	WO 2002-US5455	20020222
US 2002197705	A1 Provisional	US 2001-271044P	20010223
		US 2002-81170	20020222
EP 1364006	A2	EP 2002-724994	20020222
		WO 2002-US5455	20020222
AU 2002255590	A1	AU 2002-255590	20020222

FILING DETAILS:

PATENT NO	KIND	PATENT NO
EP 1364006	A2 Based on	WO 2002068632
AU 2002255590	A1 Based on	WO 2002068632

PRIORITY APPLN. INFO: US 2001-271044P 20010223; US 2002-81170 20020222

AN 2002-706991 [76] WPIDS

AB WO 200268632 A UPAB: 20021125

NOVELTY - An isolated **mutant cell** (I) comprising decreased levels of **sialic** acid containing host **cell** receptors for **influenza** virus relative to a corresponding **wild-type cell** which supports efficient **influenza** virus replication, is new.

DETAILED DESCRIPTION - INDEPENDENT CLAIMS are also included for the following:

(1) isolating a cell that has decreased levels of receptors for **influenza** virus, comprising:

(a) contacting a population of cells permissive for **influenza** virus replication and sensitive to **lectin** or agglutinin growth inhibition with an amount of **lectin** or agglutinin to yield cells that are resistant to growth inhibition by the **lectin** or agglutinin that specifically binds **sialic** acid; and

(b) isolating a **lectin**- or agglutinin-resistant cell having decreased levels of receptors for **influenza** virus;

(2) a **lectin**- or agglutinin-resistant cell isolated by method (1);

(3) propagating **influenza** viruses having reduced sialidase activity by contacting (I) and the **lectin**- or agglutinin-resistant cell with an amount of an **influenza** virus having reduced sialidase activity to yield progeny virus;

(4) a progeny virus obtained by method (3);

(5) using a host cell having decreased levels of **sialic** acid containing host cell receptors for **influenza** virus, comprising:

(a) contacting (I) and the **lectin**- or agglutinin-resistant **cell** with an amount of an **influenza** virus having **wild-type** levels of sialidase activity to yield progeny virus; and

(b) serially propagating the progeny virus with (I) and the **lectin**- or agglutinin-resistant cell to yield adapted viruses that efficiently replicate in the **mutant** cell and the **lectin** - or agglutinin-resistant cell; and

(6) isolated adapted virus obtained by method (5), which does not have a **mutation** in the hemagglutinin (HA) gene relative to the virus having substantially wild-type levels of sialidase activity.

ACTIVITY - Virucide; Immunomodulator.

No biological data is given.

MECHANISM OF ACTION - Vaccine; Gene therapy.

USE - The **mutant** cell is useful in propagating **influenza** virus having reduced or decreased sialidase activity. The obtained virus may be employed in vaccines, in preparing monoclonal or polyclonal antibodies specific for those viruses, in preparing recombinant or reassortant viruses, or for gene delivery including the delivery of immunogenic non-**influenza** virus proteins or peptide for vaccines or therapeutic proteins.

Dwg.0/3

L17 ANSWER 2 OF 9 MEDLINE on STN DUPLICATE 1

ACCESSION NUMBER: 2002283390 MEDLINE

DOCUMENT NUMBER: PubMed ID: 11884410

TITLE: Role of phosphatidylserine exposure and sugar chain desialylation at the surface of **influenza** virus-infected cells in efficient phagocytosis by macrophages.

AUTHOR: Watanabe Yuichi; Shiratsuchi Akiko; Shimizu Kazufumi; Takizawa Takenori; Nakanishi Yoshinobu

CORPORATE SOURCE: Graduate School of Medical Science, Kanazawa University, 13-1 Takara-machi, Kanazawa, Ishikawa 920-0934, Japan.

SOURCE: Journal of biological chemistry, (2002 May 17) 277 (20) 18222-8.
Journal code: 2985121R. ISSN: 0021-9258.

PUB. COUNTRY: United States

DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)

LANGUAGE: English

FILE SEGMENT: Priority Journals

ENTRY MONTH: 200207

ENTRY DATE: Entered STN: 20020528
Last Updated on STN: 20030105
Entered Medline: 20020716

AB HeLa cells infected with **influenza** A virus undergo typical caspase-dependent apoptosis and are efficiently phagocytosed by mouse peritoneal macrophages in a manner mediated by the membrane phospholipid

phosphatidylserine, which is translocated to the surface of virus-infected cells during apoptosis. However, the extent of phagocytosis is not always parallel with the level of phosphatidylserine externalization. Here we examined the involvement of **influenza** virus neuraminidase (NA) in efficient phagocytosis of virus-infected cells. HeLa **cells** infected with an **influenza** virus strain expressing temperature-sensitive NA underwent apoptosis and produced viral proteins, including the defective NA, at a non-permissive temperature to almost the same extent as **cells** infected with the **wild-type** virus. The cells were, however, phagocytosed by macrophages with reduced efficiency. In addition, phagocytosis of **cells** infected with the **wild-type** virus was severely inhibited when the **cells** had been maintained in the presence of the NA inhibitor zanamivir. On the other hand, the binding of **sialic** acid-recognizing **lectins** to the **cell** surface declined after infection with the **wild-type** virus. The decrease in the extent of **lectin** binding was greatly attenuated when **cells** were infected with the **mutant** virus or when **wild-type** virus-infected **cells** were maintained in the presence of zanamivir. These results indicate that sugar chains are desialylated by NA at the surface of virus-infected cells. We conclude that the presence of both phosphatidylserine and asialoglycomoieties on the cell surface is required for efficient phagocytosis of **influenza** virus-infected cells by macrophages.

L17 ANSWER 3 OF 9 MEDLINE on STN DUPLICATE 2
ACCESSION NUMBER: 2001166411 MEDLINE
DOCUMENT NUMBER: PubMed ID: 11264365
TITLE: Adaptation of **influenza** A viruses to cells expressing low levels of **sialic** acid leads to loss of neuraminidase activity.
AUTHOR: Hughes M T; McGregor M; Suzuki T; Suzuki Y; Kawaoka Y
CORPORATE SOURCE: Department of Pathobiological Sciences, School of Veterinary Medicine, University of Wisconsin-Madison, Madison, Wisconsin 53706, USA.
SOURCE: Journal of virology, (2001 Apr) 75 (8) 3766-70. Journal code: 0113724. ISSN: 0022-538X.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 200104
ENTRY DATE: Entered STN: 20010417
Last Updated on STN: 20010417
Entered Medline: 20010412

AB **Influenza** A viruses possess two virion surface proteins, hemagglutinin (HA) and neuraminidase (NA). The HA binds to sialyloligosaccharide viral receptors, while the NA removes **sialic** acids from the host cell and viral sialyloligosaccarides. Alterations of the HA occur during adaptation of **influenza** viruses to new host species, as in the 1957 and 1968 **influenza** pandemics. To gain a better understanding of the contributions of the HA and possibly the NA to this process, we generated **cell** lines expressing reduced levels of the **influenza** virus receptor determinant, **sialic** acid, by selecting **Madin-Darby canine** kidney **cells** resistant to a **lectin** specific for **sialic**

acid linked to galactose by alpha(2-3) or alpha(2-6) linkages. One of these cell lines had less than 1/10 as much N-**acetylneuraminic** acid as its parent cell line. When serially passaged in this cell line, human H3N2 viruses lost sialidase activity due to a large internal deletion in the NA gene, without alteration of the HA gene. These findings indicate that NA **mutations** can contribute to the adaptation of **influenza** A virus to new host environments and hence may play a role in the transmission of virus across species.

L17 ANSWER 4 OF 9 EMBASE COPYRIGHT 2004 ELSEVIER INC. ALL RIGHTS RESERVED. on STN

ACCESSION NUMBER: 2001192176 EMBASE
TITLE: Safe as mother's milk: Carbohydrates as future anti-adhesion drugs for bacterial diseases.
AUTHOR: Sharon N.; Ofek I.
CORPORATE SOURCE: N. Sharon, Department of Biological Chemistry, Weizmann Institute of Science, Rehovot 76100, Israel. bfsharon@weizmann.weizmann.ac.il
SOURCE: Glycoconjugate Journal, (2000) 17/7-9 (659-664). Refs: 24
ISSN: 0282-0080 CODEN: GLJOEW
COUNTRY: Netherlands
DOCUMENT TYPE: Journal; General Review
FILE SEGMENT: 030 Pharmacology
037 Drug Literature Index
LANGUAGE: English
SUMMARY LANGUAGE: English

AB The majority of infectious diseases are initiated by adhesion of pathogenic organisms to the tissues of the host. In many cases, this adhesion is mediated by **lectins** present on the surface of the infectious organism that bind to complementary carbohydrates on the surface of the host tissues. **Lectin**-deficient **mutants** often lack ability to initiate infection. Soluble carbohydrates recognized by the bacterial **lectins** block the adhesion of the bacteria to **animal cells** in vitro. Moreover, they have also been shown to protect against experimental infection by **lectin**-carrying bacteria in different organs of **mammals** such as mice, rabbits, calves and **monkeys**. In a phase II clinical trial, a pentasaccharide shown to have anti-adhesive activity against Streptococcus pneumoniae and Hemophilus **influenzae** in vitro failed to protect young children from nasopharyngeal colonization with these organisms and from developing otitis media. This could be because insufficient drug was delivered via nasal spray, because bacteria express multiple specificities, the inhibition of which may require a cocktail of oligosaccharides, or because children have different carbohydrate receptors from those of adults. The results of a clinical trial in which N-acetylneuraminyl(α2-3)lactose was administered orally to Helicobacter pylori positive patients in an effort to reduce or eradicate bacterial colonization, are awaited with interest. Although the high cost of production of the required oligosaccharides is falling with the recent introduction of enzymatic methods of synthesis, new technologies, in particular the use of engineered bacteria, promise to lower it even further. Attachment of the oligosaccharides to soluble polymeric carriers will increase greatly their effectiveness as antiadhesion agents. There is no doubt that anti-adhesive oligosaccharides will in the near future join the arsenal of drugs for the therapy of bacterial diseases.

L17 ANSWER 5 OF 9 MEDLINE on STN DUPLICATE 3
ACCESSION NUMBER: 1999196647 MEDLINE
DOCUMENT NUMBER: PubMed ID: 10099011
TITLE: **Cell**-surface sialoglycoconjugate structures in **wild-type** and **mutant** Crithidia fasciculata.
AUTHOR: do Valle Matta M A; Sales Alviano D; dos Santos Silva Couceiro J N; Nazareth M; Meirelles L; Sales Alviano C; Angluster J
CORPORATE SOURCE: Departamento de Ultra-estrutura e Biologia Celular, Instituto Oswaldo Cruz, Fundacao Oswaldo Cruz, Rio de Janeiro, RJ, Brazil.
SOURCE: Parasitology research, (1999 Apr) 85 (4) 293-9. Journal code: 8703571. ISSN: 0932-0113.
PUB. COUNTRY: GERMANY: Germany, Federal Republic of
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 199907
ENTRY DATE: Entered STN: 19990727
Last Updated on STN: 19990727
Entered Medline: 19990715

AB The **cell**-surface expression of sialoglycoconjugate structures in **wild-type** Crithidia fasciculata and its TFR(R1) drug-resistant **mutant** was analyzed with the aid of an **influenza** C virus strain, **lectin**, enzymatic treatment, and flow cytofluorimetry analysis probed with fluorescein isothiocyanate-labeled (FITC) **lectins**. 9-O-Acetyl-N-**acetyl neuraminic** acid (Neu5,9Ac2) structures mediate **influenza** C virus **cell**-binding. The SAalpha2,3Gal and SAalpha2,6Gal sequences are specifically recognized by Maackia amurensis (MAA) and Sambucus nigra (SNA) **lectins**, respectively. On the basis of these parameters the TFR(R1) **mutant** strain of C. fasciculata was found to contain exposed sialoglycoconjugates bearing Neu5,9Ac2 surface structures. After the removal of **sialic** acid residues by neuraminidase activity the marked increases in PNA (peanut agglutinin)-mediated agglutinating activity showed that those acidic units on C. fasciculata cells were glycosidically linked to D-galactose. The bond involves SAalpha2,6Gal and SAalpha2,3Gal linkages as suggested by the use of FITC-SNA and FITC-MAA **lectins**, respectively. Both SAalpha2,3Gal and SAalpha2,6Gal sequences were preferentially expressed by the TFR(R1) **mutant**. The SAalpha2,6 linkage markedly predominated. In the TFR(R1) **mutant**, but not in **wild-type cells**, two distinct populations of **cells** were distinguished by reactivity with FITC-SNA, one of which was enriched with surface SAalpha2,6Gal sequences. These diverse findings suggest that sialoglycoconjugate structures present on the flagellate surface may be associated with **mutation** and the cell growth cycle in C. fasciculata.

L17 ANSWER 6 OF 9 CABA COPYRIGHT 2004 CABI on STN
ACCESSION NUMBER: 1999:44193 CABA
DOCUMENT NUMBER: 19990802222
TITLE: **Cell**-surface sialoglycoconjugate structures in **wild-type** and

mutant Crithidia fasciculata

AUTHOR: Matta, M. A. do V.; Alviano, D. S.; Couceiro, J. N. dos S. S.; Nazareth, M.; Meirelles, L.; Alviano, C. S.; Angluster, J.

CORPORATE SOURCE: Instituto de Microbiologia Professor Paulo de Goes, Universidade Federal do Rio de Janeiro, Cidade Universitaria, Ilha do Fundao, 21944-590 Rio de Janeiro, RJ, Brazil.

SOURCE: Parasitology Research, (1999) Vol. 85, No. 4, pp. 293-299. 60 ref.
ISSN: 0044-3255

DOCUMENT TYPE: Journal
LANGUAGE: English
ENTRY DATE: Entered STN: 19990414
Last Updated on STN: 19990414

AB The **cell**-surface expression of sialoglycoconjugate structures in **wild-type** Crithidia fasciculata and its drug-resistant **mutant** (TFRR1) was analysed with the aid of an **influenza** C virus strain, **lectin**, enzymatic treatment and flow cytofluorometry analysis probed with fluorescein isothiocyanate-labelled (FITC) **lectins**. 9-O-acetyl-N-**acetyl neuraminic** acid (Neu5,9Ac2) structures mediate **influenza** C virus **cell**-binding. The **SA**[alpha]2,3Gal and **SA**[alpha]2,6Gal sequences are specifically recognized by Maackia amurensis (MAA) and Sambucus nigra (SNA) **lectins**, respectively. Using these parameters, the TFRR1 **mutant** strain was shown to contain exposed sialoglycoconjugates bearing Neu5,9Ac2 surface structures. After the removal of **sialic** acid residues by neuraminidase activity, the marked increases in PNA (peanut agglutinin)-mediated agglutinating activity showed that those acidic units were glycosidically linked to D-galactose. The bond involves **SA**[alpha]2,6Gal and **SA**[alpha]2,3Gal linkages, as suggested by the use of FITC-SNA and FITC-MAA **lectins**, respectively. Both **SA**[alpha]2,3Gal and **SA**[alpha]2,6Gal sequences were preferentially expressed by the TFRR1 **mutant**. The **SA**[alpha]2,6 linkage markedly predominated. In the TFRR1 **mutant**, but not **wild-type cells**, 2 distinct populations of **cells** were distinguished by reactivity with FITC-SNA, one of which was enriched with surface **SA**[alpha]2,6Gal sequences. The results suggest that sialoglycoconjugate structures present on the **cell** surface may be associated with **mutation** and the **cell** growth cycle in C. fasciculata.

L17 ANSWER 7 OF 9 JICST-EPlus COPYRIGHT 2004 JST on STN
ACCESSION NUMBER: 990045472 JICST-EPlus
TITLE: **Influenza** Viruses and their Receptor Sugar Recognition.
AUTHOR: SUZUKI YASUO
CORPORATE SOURCE: Univ. of Shizuoka, Sch. of Pharm. Sci.
SOURCE: Tanpakushitsu Kakusan Koso (Protein, Nucleic Acid and Enzyme), (1998) vol. 43, no. 16, pp. 2559-2566. Journal Code: F0325A (Fig. 6, Tbl. 3, Ref. 33)
CODEN: TAKKAJ; ISSN: 0039-9450
PUB. COUNTRY: Japan
DOCUMENT TYPE: Journal; General Review
LANGUAGE: Japanese

STATUS: New

AB This paper briefly outlines the molecular mechanisms how the **influenza** virus is propagated into other **animal** species beyond the barrier of host's species specificity by focusing on the knowledges on **influenza** virus A(A). The hemagglutinin of A is proved to have molecular evolution by receiving host dependent selection in **sialic** acid molecular species of Neu5Ac, andNeu5Gc of the sialoglyco chains of host **cell** membrane receptors. Research results on the host range of A, **mutation** in A, A receptor's sialoglyco chain recognition specificity, and the selection occurred in the evolution of A for its receptor's sialoglyco chains are described.

L17 ANSWER 8 OF 9 MEDLINE on STN DUPLICATE 4
ACCESSION NUMBER: 97214021 MEDLINE
DOCUMENT NUMBER: PubMed ID: 9060710
TITLE: Differences in **sialic** acid-galactose linkages in the chicken egg amnion and allantois influence human **influenza** virus receptor specificity and variant selection.
AUTHOR: Ito T; Suzuki Y; Takada A; Kawamoto A; Otsuki K; Masuda H; Yamada M; Suzuki T; Kida H; Kawaoka Y
CORPORATE SOURCE: Department of Disease Control, Graduate School of Veterinary Medicine, Hokkaido University, Sapporo, Japan.
CONTRACT NUMBER: AI33898 (NIAID)
SOURCE: Journal of virology, (1997 Apr) 71 (4) 3357-62.
Journal code: 0113724. ISSN: 0022-538X.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
OTHER SOURCE: GENBANK-U77831; GENBANK-U77832; GENBANK-U77833; GENBANK-U77834; GENBANK-U77835; GENBANK-U77836; GENBANK-U77837; GENBANK-U77838; GENBANK-U77839; GENBANK-U77840
ENTRY MONTH: 199704
ENTRY DATE: Entered STN: 19970424
Last Updated on STN: 19990129
Entered Medline: 19970411

AB Human **influenza** viruses are more efficiently isolated by inoculating patient samples into the amniotic rather than the allantoic cavity of embryonated chicken eggs. This type of cultivation selects virus variants with **mutations** around the hemagglutinin (HA) receptor binding site. To understand the molecular basis of these phenomena, we investigated the abundances of **sialic** acid (**SA**) linked to galactose (Gal) by the alpha-2,3 linkage (**SA** alpha2,3Gal) and **SA** alpha2,6Gal in egg amniotic and allantoic **cells** and in **Madin-Darby canine** kidney (**MDCK**) **cells**. Using SA-Gal linkage-specific **lectins** (Maackia amurensis agglutinin specific for SA alpha2,6Gal and Sambucus nigra agglutinin specific for SA alpha2,3Gal), we found SA alpha2,3Gal in both allantoic and amniotic cells and SA alpha2,6Gal in only the amniotic cells. **MDCK cells** contained both linkages. To investigate how this difference in abundances of SA alpha2,3Gal and SA alpha2,6Gal in allantoic and amniotic **cells** affects the appearance of host **cell** variants in eggs, we determined the receptor specificities and HA amino acid sequences of two

different patient viruses which were isolated and passaged in the amnion or in the allantois and which were compared with **MDCK cell**-grown viruses. We found that the viruses maintained high SA alpha2,6Gal specificities when grown in **MDCK cells** or following up to two amniotic passages; however, further passages in either the amnion or allantois resulted in the acquisition of, or a complete shift to, SA alpha2,3Gal specificity, depending on the virus strain. This change in receptor specificity was accompanied by the appearance of variants in the population with Leu-to-Gln **mutations** at position 226 in their HA. These findings suggest that lack of SA alpha2,6Gal linkages in the allantois of chicken eggs is a selective pressure for the appearance of host cell variants with altered receptor specificities and amino acid changes at position 226.

L17 ANSWER 9 OF 9 MEDLINE on STN
ACCESSION NUMBER: 81239727 MEDLINE
DOCUMENT NUMBER: PubMed ID: 6265461
TITLE: Glycosylation does not determine segregation of viral envelope proteins in the plasma membrane of epithelial cells.
AUTHOR: Green R F; Meiss H K; Rodriguez-Boulan E
SOURCE: Journal of cell biology, (1981 May) 89 (2) 230-9.
Journal code: 0375356. ISSN: 0021-9525.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 198109
ENTRY DATE: Entered STN: 19900316
Last Updated on STN: 19900316
Entered Medline: 19810915

AB Enveloped viruses are excellent tools for the study of the biogenesis of epithelial polarity, because they bud asymmetrically from confluent monolayers of epithelial cells and because polarized budding is preceded by the accumulation of envelope proteins exclusively in the plasma membrane regions from which the viruses bud. In this work, three different experimental approaches showed that the carbohydrate moieties do not determine the final surface localization of either **influenza** (WSN strain) or vesicular stomatitis virus (VSV) envelope proteins in infected **Madin-Darby Canine** Kidney (**MDCK**) **cells**, as determined by immunofluorescence and immunoelectron microscopy, using ferritin as a marker. Infected concanavalin A- and ricin 1-resistant **mutants** of **MDCK cells**, with alterations in glycosylation, exhibited surface distributions of viral glycoproteins identical to those of the parental **cell** line, i.e., **influenza** envelope proteins were exclusively found in the apical surface, whereas VSV G protein was localized only in the basolateral region. **MDCK cells** treated with tunicamycin, which abolishes the glycosylation of viral glycoproteins, exhibited the same distribution of envelope proteins as control **cells**, after infection with VSF or **influenza**. A temperature-sensitive **mutant** of **influenza** WSN, ts3, which, when grown at the nonpermissive temperature of 39.5 degrees C, retains the **sialic** acid residues in the envelope glycoproteins, showed, at both 32 degrees C (permissive temperature) and 39.5 degrees C, budding polarity and viral glycoprotein distribution identical to those of

the parental WSN strain, when grown in **MDCK cells**.
These results demonstrate that carbohydrate moieties are not components of the addressing signals that determine the polarized distribution of viral envelope proteins, and possibly of the intrinsic cellular plasma membrane proteins, in the surface of epithelial cells.

(FILE 'MEDLINE' ENTERED AT 10:49:52 ON 06 DEC 2004)
L18 22 SEA FILE=MEDLINE ABB=ON PLU=ON (NEURAMINIC ACIDS AND (MUTATION OR MUTAGENESIS OR "POLYMORPHISM (GENETICS)"))/CT
L19 2 SEA FILE=MEDLINE ABB=ON PLU=ON L18 AND LECTINS/CT

L18 22 SEA FILE=MEDLINE ABB=ON PLU=ON (NEURAMINIC ACIDS AND (MUTATION OR MUTAGENESIS OR "POLYMORPHISM (GENETICS)"))/CT
L20 1 SEA FILE=MEDLINE ABB=ON PLU=ON L18 AND ORTHOMYXOVIRIDAE/CT

L21 3 L19 OR L20

L21 ANSWER 1 OF 3 MEDLINE on STN
ACCESSION NUMBER: 2001324837 MEDLINE
DOCUMENT NUMBER: PubMed ID: 11294209
TITLE: Comparative genomics. Gene expression differs in human and chimp brains.
AUTHOR: Normile D
SOURCE: Science, (2001 Apr 6) 292 (5514) 44-5.
Journal code: 0404511. ISSN: 0036-8075.
PUB. COUNTRY: United States
DOCUMENT TYPE: News Announcement
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 200106
ENTRY DATE: Entered STN: 20010611
Last Updated on STN: 20010611
Entered Medline: 20010607
ED Entered STN: 20010611
Last Updated on STN: 20010611
Entered Medline: 20010607

L21 ANSWER 2 OF 3 MEDLINE on STN
ACCESSION NUMBER: 75018879 MEDLINE
DOCUMENT NUMBER: PubMed ID: 4472498
TITLE: Characterization of temperature sensitive influenza virus mutants defective in neuraminidase.
AUTHOR: Palese P; Tobita K; Ueda M; Compans R W
SOURCE: Virology, (1974 Oct) 61 (2) 397-410.
Journal code: 0110674. ISSN: 0042-6822.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 197501
ENTRY DATE: Entered STN: 19900310
Last Updated on STN: 19900310
Entered Medline: 19750117
ED Entered STN: 19900310

Last Updated on STN: 19900310
Entered Medline: 19750117

L21 ANSWER 3 OF 3 MEDLINE on STN
ACCESSION NUMBER: 74157535 MEDLINE
DOCUMENT NUMBER: PubMed ID: 4857008
TITLE: Glycosphingolipids of wild-type and mutant lectin-resistant Chinese hamster ovarian cells.
AUTHOR: Yogeeswaran G; Murray R K; Wright J A
SOURCE: Biochemical and biophysical research communications, (1974 Feb 27) 56 (4) 1010-6.
Journal code: 0372516. ISSN: 0006-291X.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 197407
ENTRY DATE: Entered STN: 19900310
Last Updated on STN: 19900310
Entered Medline: 19740705
ED Entered STN: 19900310
Last Updated on STN: 19900310
Entered Medline: 19740705

=> fil hom
FILE 'HOME' ENTERED AT 10:51:11 ON 06 DEC 2004

Devi, S.
10/081170

06dec04 10:53:45 User219783 Session D2066.2

SYSTEM:OS - DIALOG OneSearch
File 65:Inside Conferences 1993-2004/Nov W4
(c) 2004 BLDSC all rts. reserv.
File 440:Current Contents Search(R) 1990-2004/Dec 06
(c) 2004 Inst for Sci Info
File 348:EUROPEAN PATENTS 1978-2004/Nov W04
(c) 2004 European Patent Office
File 113:European R&D Database 1997
(c)1997 Reed-Elsevier(UK)Ltd All rts reserv
*File 113: This file is closed (no updates)
File 357:Derwent Biotech Res. _1982-2004/Dec W2
(c) 2004 Thomson Derwent & ISI

Set	Items	Description
S1	12228	SIALIC OR ACETYLNEURAMINIC OR ACETYLSIALIC OR GLYCOLYLNEURAMINIC OR GLYCOLOYLNEURAMINIC OR (AC OR ACETYL OR GLYCOLOYL OR GLYCOLYL)(1W)NEURAMINIC OR NEUNAC OR NEU(W)NAC OR NANA OR GCNEU OR GC(W)NEU OR NGNA OR SA(10N)SIALIC
S2	1193	S1 AND (INFLUENZA? OR ORTHOMYXO(W)(VIRID? OR VIRUS?) OR ORTHOMYXOVIR? OR MYXOVIR?)
S3	378	S2 AND (MUTAT? OR MUTAGEN? OR MUTANT? ? OR POLYMORPH? OR POLY(W)(MORPHISM? ? OR MORPHIC?))
S4	74	S3 AND LECTIN? ?
S5	46	S4 AND (AVES OR AVIAN OR BIRD? ? OR ANIMAL? ? OR MAMMAL? OR MINK? ? OR MDCK? ? OR MADIN(W)DARBY? OR VISON OR LUTREOLA OR MACRODON OR WILD(W)TYPE? ? OR SWINE OR BOVINE OR COW OR CATTLE OR PORCINE OR PIG? ? OR HOG? ? OR SIMIAN OR MONKEY...
S6	9	S4 AND (CHIMPANZ? OR CANINE OR DOG? ?)(10N)CELL? ?
S7	46	S5 OR S6
S8	38	RD (unique items)

-key terms

>>>No matching display code(s) found in file(s): 65, 113

8/3,AB/1 (Item 1 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)
(c) 2004 Inst for Sci Info. All rts. reserv.

13930778 Document Delivery Available: 000175685100105 References: 49
TITLE: Role of phosphatidylserine exposure and sugar chain desialylation at the surface of **influenza** virus-infected cells in efficient phagocytosis by macrophages
AUTHOR(S): Watanabe Y; Shiratsuchi A; Shimizu K; Takizawa T; Nakanishi Y (REPRINT)
AUTHOR(S) E-MAIL: nakanaka@kenroku.kanazawa-u.ac.jp
CORPORATE SOURCE: Kanazawa Univ, Grad Sch Med Sci, 13-1 Takara Machi/Kanazawa/Ishikawa 9200934/Japan/ (REPRINT); Kanazawa Univ, Grad Sch Med Sci, /Kanazawa/Ishikawa 9200934/Japan/; Nihon Univ, Itabashi Ku, /Tokyo 1738610//Japan/; Aichi Human Serv Ctr, Inst Dev Res, /Aichi 4800392//Japan/
PUBLICATION TYPE: JOURNAL
PUBLICATION: JOURNAL OF BIOLOGICAL CHEMISTRY, 2002, V277, N20 (MAY 17), P 18222-18228
GENUINE ARTICLE#: 553PR

PUBLISHER: AMER SOC BIOCHEMISTRY MOLECULAR BIOLOGY INC, 9650 ROCKVILLE PIKE, BETHESDA, MD 20814-3996 USA
ISSN: 0021-9258
LANGUAGE: English DOCUMENT TYPE: ARTICLE
ABSTRACT: HeLa cells infected with **influenza** A virus undergo typical caspase-dependent apoptosis and are efficiently phagocytosed by mouse peritoneal macrophages in a manner mediated by the membrane phospholipid phosphatidylserine, which is translocated to the surface of virus-infected cells during apoptosis. However, the extent of phagocytosis is not always parallel with the level of phosphatidylserine externalization. Here we examined the involvement of **influenza** virus neuraminidase (NA) in efficient phagocytosis of virus-infected cells. HeLa cells infected with an **influenza** virus strain expressing temperature-sensitive NA underwent apoptosis and produced viral proteins, including the defective NA, at a non-permissive temperature to almost the same extent as **cells** infected with the **wild-type** virus. The **cells** were, however, phagocytosed by macrophages with reduced efficiency. In addition, phagocytosis of **cells** infected with the **wild-type** virus was severely inhibited when the **cells** had been maintained in the presence of the NA inhibitor zanamivir. On the other hand, the binding of **sialic** acid-recognizing **lectins** to the **cell** surface declined after infection with the **wild-type** virus. The decrease in the extent of **lectin** binding was greatly attenuated when **cells** were infected with the **mutant** virus or when **wild-type** virus-infected **cells** were maintained in the presence of zanamivir. These results indicate that sugar chains are desialylated by NA at the surface of virus-infected cells. We conclude that the presence of both phosphatidylserine and asialoglycomoieties on the cell surface is required for efficient phagocytosis of **influenza** virus-infected cells by macrophages.

8/3,AB/2 (Item 2 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

13545763 Document Delivery Available: 000174091100003 References: 153
TITLE: Loss of N-**glycolylneuraminic** acid in humans: Mechanisms, consequences, and implications for hominid evolution
AUTHOR(S): Varki A (REPRINT); Ruff C
CORPORATE SOURCE: Univ Calif San Diego, Glycobiol Res & Training Ctr, /La Jolla//CA/92093 (REPRINT); Univ Calif San Diego, Glycobiol Res & Training Ctr, /La Jolla//CA/92093; Univ Calif San Diego, Dept Med, /La Jolla//CA/92093; Univ Calif San Diego, Dept Cellular & Mol Med, /La Jolla//CA/92093
PUBLICATION TYPE: BOOK IN SERIES
PUBLICATION: YEARBOOK OF PHYSICAL ANTHROPOLOGY, VOL 44, 2001, V44, P54-69
GENUINE ARTICLE#: BT80Z
BOOK SERIES TITLE: YEARBOOK OF PHYSICAL ANTHROPOLOGY
PUBLISHER: WILEY-LISS, INC, 605 THIRD AVE, NEW YORK, NY 10158-0012 USA
ISBN: **********
ISSN: 0096-848X
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: The surface of all **mammalian cells** is covered with a dense and complex array of sugar chains, which are frequently terminated by

members of a family of molecules called **sialic** acids. One particular **sialic** acid called N-**glycolylneuraminic** acid (Neu5Gc) is widely expressed on most **mammalian** tissues, but is not easily detectable on human **cells**. In fact, it provokes an immune response in adult humans. The human deficiency of Neu5Gc is explained by an inactivating **mutation** in the gene encoding CMP-N-**acetylneuraminic** acid hydroxylase, the rate-limiting enzyme in generating Neu5Gc in **cells** of other **mammals**. This deficiency also results in an excess of the precursor **sialic** acid N-**acetylneuraminic** acid (Neu5Ac) in humans. This **mutation** appears universal to modem humans, occurred sometime after our last common ancestor with the great apes, and happens to be one of the first known human-great ape genetic differences with an obvious biochemical readout. While the original selection mechanisms and major biological consequences of this human-specific **mutation** remain uncertain, several interesting clues are currently being pursued. First, there is evidence that the human condition can explain differences in susceptibility or resistance to certain microbial pathogens. Second, the functions of some endogenous receptors for **sialic** acids in the immune system may be altered by this difference. Third, despite the lack of any obvious alternate pathway for synthesis, Neu5Gc has been reported in human tumors and possibly in human fetal tissues, and traces have even been detected in normal human tissues. One possible explanation is that this represents accumulation of Neu5Gc from dietary sources of animal origin. Finally, a markedly reduced expression of hydroxylase in the brains of other mammals raises the possibility that the human-specific **mutation** of this enzyme could have played a role in human brain evolution. Yrbk Phys Anthropol 44:54-69, 2001. (C) 2001 Wiley-Liss, Inc.

8/3,AB/3 (Item 3 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

12553933 References: 29
TITLE: Adaptation of **influenza** A viruses to cells expressing low levels of **sialic** acid leads to loss of neuraminidase activity
AUTHOR(S): Hughes MT; McGregor M; Suzuki T; Suzuki Y; Kawaoka Y (REPRINT)
AUTHOR(S) E-MAIL: kawaokay@svm.vetmed.wisc.edu
CORPORATE SOURCE: Univ Wisconsin, Dept Pathobiol Sci, 2015 Linden Dr W/Madison//WI/53706 (REPRINT); Univ Wisconsin, Dept Pathobiol Sci, /Madison//WI/53706; Univ Tennessee, Dept Pathol, /Memphis//TN/38163; Univ Shizouka, Dept Biochem, /Shizuoka 4228526//Japan/; Univ Tokyo, Inst Med Sci, /Tokyo 1088639//Japan/
PUBLICATION TYPE: JOURNAL
PUBLICATION: JOURNAL OF VIROLOGY, 2001, V75, N8 (APR), P3766-3770
GENUINE ARTICLE#: 414QN
PUBLISHER: AMER SOC MICROBIOLOGY, 1752 N ST NW, WASHINGTON, DC 20036-2904 USA
ISSN: 0022-538X
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: **Influenza** A viruses possess two virion surface proteins, hemagglutinin (HA) and neuraminidase (NA). The HA binds to sialyloligosaccharide viral receptors, while the NA removes **sialic** acids from the host cell and viral sialyloligosaccarides. Alterations of the HA occur during adaptation of **influenza** viruses to new host

species, as in the 1957 and 1968 **influenza** pandemics. To gain a better understanding of the contributions of the HA and possibly the NA to this process, we generated cell lines expressing reduced levels of the **influenza** virus receptor determinant, **sialic** acid, by selecting **Madin**-Darby **canine** kidney **cells** resistant to a **lectin** specific for **sialic** acid linked to galactose by alpha (2-3) or alpha (2-6) linkages, One of these cell lines had less than 1/10 as much N-**acetylneuraminic** acid as its parent cell line. When serially passaged in this cell line, human H3N2 viruses lost sialidase activity due to a large internal deletion in the NA gene, without alteration of the HA gene. These findings indicate that NA **mutations** can contribute to the adaptation of **influenza** A virus to new host environments and hence may play a role in the transmission of virus across species.

8/3,AB/4 (Item 4 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

12110396 References: 57
TITLE: Identification of **polymorphonuclear** leukocyte and HL-60 cell receptors for adhesins of Streptococcus gordonii and Actinomyces naeslundii
AUTHOR(S): Ruhl S; Cisar JO; Sandberg AL (REPRINT)
AUTHOR(S) E-MAIL: ann.sandberg@nih.gov
CORPORATE SOURCE: Bldg 45,Room 4AN-24A, /Bethesda//MD/20892 (REPRINT); Natl Inst Dent & Craniofacial Res, NIH, /Bethesda//MD/20892
PUBLICATION TYPE: JOURNAL
PUBLICATION: INFECTION AND IMMUNITY, 2000, V68, N11 (NOV), P6346-6354
GENUINE ARTICLE#: 366LN
PUBLISHER: AMER SOC MICROBIOLOGY, 1752 N ST NW, WASHINGTON, DC 20036-2904 USA
ISSN: 0019-9567
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: Interactions of oral streptococci and actinomyces with **polymorphonuclear** leukocytes (PMNs), mediated by **sialic** acid- and Gal/GalNAc-reactive adhesins, respectively, result in activation of the PMNs and thereby may contribute to the initiation of oral inflammation. Sialidase treatment of PMNs or HL-60 cells abolished adhesion of Streptococcus gordonii but was required for adhesion of Actinomyces naeslundii, The same effects of sialidase were noted for adhesion of these bacteria to a major 150-kDa surface glycoprotein of either PMNs or undifferentiated HL-60 cells and to a 130-kDa surface glycoprotein of differentiated HL-60 cells. These glycoproteins were both identified as leukosialin (CD43) by immunoprecipitation with a specific monoclonal antibody (MAb), Adhesion of streptococci and actinomyces to a 200-kDa minor PMN surface glycoprotein was also detected by bacterial overlay of untreated and sialidase-treated nitrocellulose transfers, respectively. This glycoprotein was identified as leukocyte common antigen (CD45) by immunoprecipitation with a specific MAb. CD43 and CD45 both possess extracellular mucinlike domains in addition to intracellular domains that are implicated in signal transduction, Consequently, the interactions of streptococci and actinomyces with the mucinlike domains of these **mammalian cell** surface glycoproteins result not only in

adhesion but, in addition, may represent the initial step in PMN activation by these bacteria.

8/3,AB/5 (Item 5 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

10977090 References: 22
TITLE: Selection of receptor-binding variants of human **influenza** A and B viruses in baby hamster kidney cells.
AUTHOR(S): Govorkova EA; Matrosovich MN; Tuzikov AB; Bovin NV; Gerdil C; Fanget B; Webster RG (REPRINT)
AUTHOR(S) E-MAIL: Robert.Webster@stjude.org
CORPORATE SOURCE: St Jude Childrens Res Hosp, Dept Virol & Mol Biol, 332 N Lauderdale St/Memphis//TN/38105 (REPRINT); St Jude Childrens Res Hosp, Dept Virol & Mol Biol, /Memphis//TN/38105; Russian Acad Med Sci, DI Ivanovskii Virol Inst, /Moscow 123098//Russia/; Russian Acad Med Sci, MP Chumakov Inst Poliomyelitis & Viral Encephalit, /Moscow 142782//Russia/; Russian Acad Sci, MM Shemyakin Bioorgan Chem Inst, /Moscow 117871//Russia/; Pasteur Merieux, Dept Pharmaceut Dev, /F-69280 Marcy Etolle//France/; Univ Tennessee, Dept Pathol, /Memphis//TN/38163
PUBLICATION TYPE: JOURNAL
PUBLICATION: VIROLOGY, 1999, V262, N1 (SEP 15), P31-38
GENUINE ARTICLE#: 240DY
PUBLISHER: ACADEMIC PRESS INC, 525 B ST, STE 1900, SAN DIEGO, CA 92101-4495 USA
ISSN: 0042-6822
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: Cultivation of human **influenza** viruses in the allantoic cavity of embryonated chicken eggs leads to a selection of receptor-binding variants with amino acid substitutions on the globular head of the hemagglutinin (HA) molecule. Such selection can be avoided by growing the human viruses in **Madin** Darby **canine** kidney (**MDCK**) **cells**. In the present study, we tested whether baby hamster kidney (BHK) cells select receptor-binding **mutants** of human **influenza** viruses. After isolating H1N1, H3N2, and type B **influenza** Viruses from clinical samples in **MDCK cells**, we passaged them in either BHK **cells** or chicken eggs. The BHK-grown viruses differed from their **MDCK**-grown counterparts by virtue of **mutations** in the HA: 225 D --> G (H1N1 virus), 128T --> A and 2261 --> V (H3N2), and 187N --> D (type B). (H3 numbering). Variants with different substitutions were selected by passaging of the same MDCK-grown parents in eggs: 141L --> H, 208R --> H, and 225D --> G (H1N1), 194L --> l (H3N2), and 137G --> R (B). Compared with their MDCK-grown counterparts, both BHK- and egg-grown viruses possessed a higher affinity for the cellular membranes of BHK cells and of the chorioallantoic cells of chicken embryos and for a 3'-sialylgalactose-containing synthetic sialylglycopolymer. By contrast, changes in the affinity of **mutants** for a 6'-sialyl-(N-acetyllactosamine)-containing sialylglycopolymer varied from negative to positive. Fluorescence-activated cell-sorting analysis with linkage-specific **lectins** showed that the density of the 6'-sialy[-(N-acetyllactosamine)-containing receptors is substantially lower on the surface of BHK **cells** than on **MDCK cells**, providing an explanation for the growth restriction of human viruses in the former

cells. Our data demonstrate that cultures of BHK cells, like eggs, can select receptor-binding variants of human **influenza** viruses. (C) 1999 Academic Press.

8/3,AB/6 (Item 6 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

10880544 References: 42
TITLE: trans-sialidase of Trypanosoma cruzi: Location of galactose-binding site(s)
AUTHOR(S): Chuenkova M (REPRINT); Pereira M; Taylor G
AUTHOR(S) E-MAIL: mtchou01@emerald.tufts.edu
CORPORATE SOURCE: Tufts Univ, Dept Pathol, 136 Harrison Ave/Boston//MA/02111 (REPRINT); Tufts Univ, Dept Pathol, /Boston//MA/02111; Univ Bath, Dept Biol & Biochem, /Bath BA2 7AY/Avon/England/
PUBLICATION TYPE: JOURNAL
PUBLICATION: BIOCHEMICAL AND BIOPHYSICAL RESEARCH COMMUNICATIONS, 1999, V 262, N2 (AUG 27), P549-556
GENUINE ARTICLE#: 232AF
PUBLISHER: ACADEMIC PRESS INC, 525 B ST, STE 1900, SAN DIEGO, CA 92101-4495 USA
ISSN: 0006-291X
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: Trypanosoma cruzi expresses a trans-sialidase on its surface, which catalyzes the transfer of **sialic** acid from mammalian host glycans to its own surface glycoproteins. It has been proposed that the enzyme consists of three domains prior to a long C-terminal repeating sequence that is not required for enzyme activity. The first of these domains shares significant sequence identity with bacterial sialidases which catalyse the hydrolysis of **sialic** acid. Here we report the sequence of the N-terminal domains of the TS19y trans-sialidase gene, which was expressed in bacteria with the same specific activity as natural enzyme of T. cruzi. Various deletion **mutants** of TS19y, without the C-terminal tandem repeat, have been cloned and expressed and their trans-sialidase and sialidase activities measured. These experiments show that all three N-terminal domains are required for full trans-sialidase activity, though only the first is necessary for sialidase activity. Some transferase activity is observed, however, even with the shortest construct comprising the first N-terminal domain. Deletion **mutants** to probe the role of the N-terminal residues of the first domain suggest that the first 33 residues are also required for trans-sialidase activity, but not for sialidase activity. Molecular modelling of the first N-terminal domain of TS19y based on our structures of bacterial sialidases and site-directed **mutations** suggests the location of a galactose-binding site within this domain. (C) 1999 Academic Press.

8/3,AB/7 (Item 7 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

10324853 References: 60

TITLE: **Cell**-surface sialoglycoconjugate structures in **wild-type** and **mutant** Crithidia fasciculata
AUTHOR(S): Matta MAD; Alviano DS (REPRINT); Couceiro JNDS; Nazareth M; Meirelles L; Alviano CS; Angluster J
AUTHOR(S) E-MAIL: IMMGCEU@MICROBIO.UFRJ.BR
CORPORATE SOURCE: Univ Fed Rio de Janeiro, Inst Microbiol Prof Paulo Goes, Bloco 1,Cidade Univ/BR-21944590 Rio De Janeiro//Brazil/ (REPRINT); Univ Fed Rio de Janeiro, Inst Microbiol Prof Paulo Goes, /BR-21944590 Rio De Janeiro//Brazil/; Fdn Oswaldo Cruz, Lab Ultraestrutura Celular, /BR-21045900 Rio De Janeiro//Brazil/
PUBLICATION TYPE: JOURNAL
PUBLICATION: PARASITOLOGY RESEARCH, 1999, V85, N4 (APR), P293-299
GENUINE ARTICLE#: 170UY
PUBLISHER: SPRINGER VERLAG, 175 FIFTH AVE, NEW YORK, NY 10010 USA
ISSN: 0044-3255
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: The **cell**-surface expression of sialoglycoconjugate structures in **wild-type** Crithidia fasciculata and its TFRR1 drug-resistant **mutant** was analyzed with the aid of an **influenza** C virus strain, **lectin**, enzymatic treatment, and flow cytofluorimetry analysis probed with fluorescein isothiocyanate-labeled (FITC) **lectins**. 9-O-Acetyl-N-**acetyl neuraminic** acid (Neu5,9Ac(2)) structures mediate **influenza** C virus cell-binding. The SA alpha 2,3Gal and SA alpha 2,6Gal sequences are specifically recognized by Maackia amurensis (MAA) and Sambucus nigra (SNA) **lectins**, respectively. On the basis of these parameters the TFRR1 **mutant** strain of C. fasciculata was found to contain exposed sialoglycoconjugates bearing Neu5,9Ac2 surface structures. After the removal of **sialic** acid residues by neuraminidase activity the marked increases in PNA (peanut agglutinin)-mediated agglutinating activity showed that those acidic units on C. fasciculata cells were glycosidically linked to D-galactose. The bond involves SA alpha 2,6Gal and SA alpha 2,3Gal linkages as suggested by the use of FITC-SNA and FITC-MAA **lectins**, respectively. Both SA alpha 2,3Gal and SA alpha 2,6Gal sequences were preferentially expressed by the TFRR1 **mutant**. The SA alpha 2,6 linkage markedly predominated. In the TFRR1 **mutant**, but not in **wild-type cells**, two distinct populations of **cells** were distinguished by reactivity with FITC-SNA, one of which was enriched with surface SA alpha 2,6Gal sequences. These diverse findings suggest that sialoglycoconjugate structures present on the flagellate surface may be associated with **mutation** and the cell growth cycle in C. fasciculata.

8/3,AB/8 (Item 8 from file: 440)
DIALOG(R)File 440:Current Contents Search(R)

08275661 References: 35
TITLE: Differences in **sialic** acid-galactose linkages in the chicken egg amnion and allantois influence human **influenza** virus receptor specificity and variant selection
AUTHOR(S): Ito T; Suzuki Y; Takada A; Kawamoto A; Otsuki K; Masuda H; Yamada M; Suzuki T; Kida H; Kawaoka Y (REPRINT)
CORPORATE SOURCE: ST JUDE CHILDRENS HOSP,DEPT VIROL & MOL BIOL, 332 N LAUDERDALE, POB 318/MEMPHIS//TN/38101 (REPRINT); ST JUDE CHILDRENS

HOSP,DEPT VIROL & MOL BIOL/MEMPHIS//TN/38101; HOKKAIDO UNIV,GRAD SCH VET MED, DEPT DIS CONTROL, MICROBIOL LAB/SAPPORO/HOKKAIDO 060/JAPAN/; TOTTORI UNIV,FAC AGR, DEPT VET PUBL HLTH/TOTTORI 680//JAPAN/; TOTTORI PREFECTURE INST HLTH,/TOTTORI 680//JAPAN/; SHIZUOKA UNIV,SCH PHARMACEUT SCI, DEPT BIOCHEM/SHIZUOKA 422//JAPAN/; UNIV TENNESSEE,DEPT PATHOL/MEMPHIS//TN/38163
PUBLICATION TYPE: JOURNAL
PUBLICATION: JOURNAL OF VIROLOGY, 1997, V71, N4 (APR), P3357-3362
GENUINE ARTICLE#: WM911
PUBLISHER: AMER SOC MICROBIOLOGY, 1325 MASSACHUSETTS AVENUE, NW, WASHINGTON, DC 20005-4171
ISSN: 0022-538X
LANGUAGE: English DOCUMENT TYPE: ARTICLE

ABSTRACT: Human **influenza** viruses are more efficiently isolated by inoculating patient samples into the amniotic rather than the allantoic cavity of embryonated chicken eggs, This type of cultivation selects virus variants with **mutations** around the hemagglutinin (HA) receptor binding site. To understand the molecular basis of these phenomena, we investigated the abundances of **sialic** acid (**SA**) linked to galactose (Gal) by the alpha-2,3 linkage (SA alpha 2,3Gal) and SA alpha 2,6Gal in egg amniotic and allantoic **cells** and in **Madin-Darby canine** kidney (**MDCK**) **cells**, Using SA-Gal linkage-specific **lectins** (Maackia amurensis agglutinin specific for SA alpha 2,6Gal and Sambucus nigra agglutinin specific for SA alpha 2,3Gal), we found SA alpha 2,3Gal in both allantoic and amniotic **cells** and SA alpha 2,6Gal in only the amniotic **cells**, **MDCK; cells** contained both linkages, To investigate how this difference in abundances of SA alpha 2,3Gal and SA alpha 2,6Gal in allantoic and amniotic cells affects the appearance of host cell variants in eggs, we determined the receptor specificities and HA amino acid sequences of two different patient viruses which were isolated and passaged in the amnion or in the allantois and which were compared with **MDCK cell** grown viruses, We found that the viruses maintained high SA alpha 2,6Gal specificities when grown in **MDCK cells** or following up to two amniotic passages; however, further passages in either the amnion or allantois resulted in the acquisition of, or a complete shift to, SA alpha 2,3Gal specificity, depending on the virus strain. This change in receptor specificity was accompanied by the appearance of variants in the population with Leu-to Gln **mutations** at position 226 in their HA, These findings suggest that lack of SA alpha 2,6Gal linkages in the allantois of chicken eggs is a selective pressure for the appearance of host cell variants with altered receptor specificities and amino acid changes at position 226.

8/3,AB/9 (Item 9 from file: 440)

07540329 References: 84
TITLE: STRUCTURAL BASIS OF **LECTIN**-CARBOHYDRATE RECOGNITION
AUTHOR(S): WEIS WI; DRICKAMER K
CORPORATE SOURCE: STANFORD UNIV,SCH MED,DEPT BIOL STRUCT/STANFORD//CA/94305 (Reprint); UNIV OXFORD,DEPT BIOCHEM,GLYCOBIOL INST/OXFORD OX1 3QU//ENGLAND/

PUBLICATION: ANNUAL REVIEW OF BIOCHEMISTRY, 1996, V65, P441-473
GENUINE ARTICLE#: UV922
ISSN: 0066-4154
LANGUAGE: ENGLISH DOCUMENT TYPE: REVIEW

ABSTRACT: **Lectins** are responsible for **cell** surface sugar recognition in bacteria, **animals**, and plants. Examples include bacterial toxins; **animal** receptors that mediate **cell-cell** interactions, uptake of glycoconjugates, and pathogen neutralization; and plant toxins and mitogens. The structural basis for selective sugar recognition by members of all of these groups has been investigated by x-ray crystallography. Mechanisms for sugar recognition have evolved independently in diverse protein structural frameworks, but share some key features. Relatively low affinity binding sites for monosaccharides are formed at shallow indentations on protein surfaces. Selectivity is achieved through a combination of hydrogen bonding to the sugar hydroxyl groups with van der Waals packing, often including packing of a hydrophobic sugar face against aromatic amino acid side chains. Higher selectivity of binding is achieved by extending binding sites through additional direct and water-mediated contacts between oligosaccharides and the protein surface. Dramatically increased affinity for oligosaccharides results from clustering of simple binding sites in oligomers of the **lectin** polypeptides. The geometry of such oligomers helps to establish the ability of the **lectins** to distinguish surface arrays of polysaccharides in some instances and to crosslink glycoconjugates in others.

8/3,AB/10 (Item 1 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01802044
18 human secreted proteins
18 sekretierte menschliche Proteine
18 proteines humaines secretees
PATENT ASSIGNEE:
  Human Genome Sciences, Inc., (2000045), 9410 Key West Avenue, Rockville, MD 20850, (US), (Applicant designated States: all)
INVENTOR:
  Shi, Yanggu, 710 Suffield Drive, Gaithersburg Maryland 20878, (US)
  Young, Paul, 207 Beckwith Street, Gaithersburg Maryland 20878, (US)
  Ebner, Reinhard, 9906 Shelburne Terrace # 316, Gaithersburg Maryland 20878, (US)
  Soppet, Daniel, R., 15050 Stillfield Place, Centreville, Virginia 22020, (US)
  Ruben, Steven, M., 19420 Pyrite Lane, Brookeville, MD 20833, (US)
LEGAL REPRESENTATIVE:
  VOSSIUS & PARTNER (100314), Siebertstrasse 4, 81675 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 1471072 A1 041027 (Basic)
APPLICATION (CC, No, Date): EP 2004012718 000815;
PRIORITY (CC, No, Date): US 148759 P 990816
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):
  EP 1212342 (EP 2000959237)
INTERNATIONAL PATENT CLASS: C07H-021/04; C07H-021/02; C07K-005/00;

C07K-014/00; C07K-016/00; C12Q-001/68; G01N-033/53; C12P-021/06; C12N-001/21; C12N-015/63

ABSTRACT EP 1471072 A1
The present invention relates to novel human secreted proteins and isolated nucleic acids containing the coding regions of the genes encoding such proteins. Also provided are vectors, host cells, antibodies, and recombinant methods for producing human secreted proteins. The invention further relates to diagnostic and therapeutic methods useful for diagnosing and treating diseases, disorders, and/or conditions related to these novel human secreted proteins.
ABSTRACT WORD COUNT: 64

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200444	1165
SPEC A	(English)	200444	109901
Total word count - document A			111066
Total word count - document B			0
Total word count - documents A + B			111066

8/3,AB/11 (Item 2 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01789016
Three-dimensional colorimetric assay assemblies
Dreidimensionale kolorimetrische Testanordnungen
Ensembles de dosage colorimetrique tridimensionnel
PATENT ASSIGNEE:
The Regents of the University of California, (4664150), 22nd floor, 300Lakeside Drive, Oakland, CA 94162-3550, (US), (Applicant designated States: all)
INVENTOR:
Charych, Deborah, 915 Polk Street, Albany CA 94706, (US)
Reichert, Anke, 704 Stannage, Albany CA 94706, (US)
LEGAL REPRESENTATIVE:
Murphy, Colm Damien et al (94181), Boult Wade Tennant, Verulam Gardens, 70 Gray's Inn Road, London WC1X 8BT, (GB)
PATENT (CC, No, Kind, Date): EP 1460423 A1 040922 (Basic)
APPLICATION (CC, No, Date): EP 2004001595 960213;
PRIORITY (CC, No, Date): US 389475 950213
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):
EP 809803 (EP 96906444)
INTERNATIONAL PATENT CLASS: G01N-033/53; G01N-033/543; G01N-033/544; G01N-033/545

ABSTRACT EP 1460423 A1
A direct assay is described using novel three-dimensional polymeric assemblies which change from a blue to red colour when exposed to an analyte, in one case a flu virus. The assemblies are typically in the form of liposomes which can be maintained in a suspension, and show great

intensity in their colour changes. Their method of production is also described.
ABSTRACT WORD COUNT: 61
NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200439	1218
SPEC A	(English)	200439	7670
Total word count - document A			8888
Total word count - document B			0
Total word count - documents A + B			8888

8/3,AB/12 (Item 3 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01704619
Primers for synthesizing full length cDNA clones and their use
Primer zur Synthese von vollstandigen cDNA Klonen und ihre Verwendung
Amorces pour la synthese de cADN de pleine longueur et leur utilisation
PATENT ASSIGNEE:
Research Association for Biotechnology, (4189480), 3-9, Nishi-Shimbashi 2-Chome, Minato-ku, Tokyo 105-0003, (JP), (Applicant designated States: all)
INVENTOR:
Ota, Toshio, 1-2-7-105, Tsujido Shinmachi, Fujisawa-shi, Kanagawa 251-0042, (JP)
Nishikawa, Tetsuo, 27-3-403, Hikawa-cho, Itabashi-ku, Tokyo 173-0013, (JP)
Isogai, Takao, 511-12, Ohmuro, Ami-machi, Inashiki-gun, Ibaraki 300-0303, (JP)
Hayashi, Koji, 2-10-2-2-236, Sonehigashi-cho, Toyonaka-shi, Osaka 561-0802, (JP)
Ishii, Shizuko, 4508-19-202, Yana, Kisarazu-shi, Chiba 292-0812, (JP)
Kawai, Yuri, 1-34-3, Mihara, Hakodate-shi, Hokkaido 041-0806, (JP)
Wakamatsu, Ai, 1473-4-202, Takayanagi, Kisarazu-shi, Chiba 292-0014, (JP)
Sugiyama, Tomoyasu, 5-4-3-512, Yokokawa, Sumida-ku, Tokyo 130-0035, (JP)
Nagai, Keiichi, 3-44-14-9-204, Sakuragaoka, Higashiyamato-shi, Tokyo 207-0022, (JP)
Kojima, Shinichi, 3-16-18-A102, Higashiyamada, Tsuduki-ku, Yokohama-shi, Kanagawa 224-0023, (JP)
Otsuki, Tetsuji, 2-8-27-111, Tanido-cho, Nishitokyo, Tokyo 188-0001, (JP)
Koga, Hisashi, 514-65,Nagashi, Kimitsu-shi, Chiba 292-1143, (JP)
LEGAL REPRESENTATIVE:
VOSSIUS & PARTNER (100314), Siebertstrasse 4, 81675 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 1396543 A2 040310 (Basic)
EP 1396543 A3 040331
APPLICATION (CC, No, Date): EP 2003025638 000707;
PRIORITY (CC, No, Date): JP 99194486 990708; JP 2000118774 000111; JP 2000183765 000502
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE

RELATED PARENT NUMBER(S) - PN (AN):
EP 1130094 (EP 2000114089)
INTERNATIONAL PATENT CLASS: C12N-015/12; C12N-015/10; C12N-015/85; C12N-005/10; C07K-014/47; C07K-016/18; C12Q-001/68

ABSTRACT EP 1396543 A3
Primers for synthesizing full length cDNAs and their use are provided. 830 cDNA encoding a human protein has been isolated and nucleotide sequences of 5'-, and 3'-ends of the cDNA have been determined. Furthermore, primers for synthesizing the full length cDNA have been provided to clarify the function of the protein encoded by the cDNA. The full length cDNA of the present invention containing the translation start site provides information useful for analyzing the functions of the protein.
ABSTRACT WORD COUNT: 79
NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200411	692
SPEC A	(English)	200411	99957
Total word count - document A			100649
Total word count - document B			0
Total word count - documents A + B			100649

8/3,AB/13 (Item 4 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01576828
ANTI-**INFLUENZA** DRUGS
GRIPPEMITTEL
MEDICAMENT CONTRE LA GRIPPE DE TYPE A
PATENT ASSIGNEE:
Boehringer Ingelheim International GmbH, (291809), Postfach 200, 55216 Ingelheim, (DE), (Applicant designated States: all)
Techno Network Shikoku Co., Ltd., (4310570), 2-5, Marunouchi, Takamatsu-shi, Kagawa 760-0033, (JP), (Applicant designated States: all)
INVENTOR:
KIDO, Hiroshi, c/o The University of Tokushima, 3-18-15, Kuramoto-Cho, Tokushima-Shi, Tokushima 770-0042, (JP)
LEGAL REPRESENTATIVE:
Kompter, Hans-Michael, Dr. et al (72955), Boehringer Ingelheim GmbH, CD Patents, 55216 Ingelheim am Rhein, (DE)
PATENT (CC, No, Kind, Date): EP 1437134 A1 040714 (Basic)
WO 2003020258 030313
APPLICATION (CC, No, Date): EP 2002762982 020903; WO 2002JP8940 020903
PRIORITY (CC, No, Date): JP 2001267236 010904
DESIGNATED STATES: AT; BE; BG; CH; CY; CZ; DE; DK; EE; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE; SK; TR
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: A61K-031/137; A61P-031/16; A61P-043/00

ABSTRACT EP 1437134 A1
An anti-**influenzal** agent comprises, as an effective component, ambroxol, bromhexin or a pharmaceutically acceptable salt thereof. This agent is characterized in that it has an anti-**influenzal** effect through the promotion of the secretion of biological factors, which possess **influenza** virus-proliferation-inhibitory effect and are included in the fluid secreted in the respiratory tract. It is also characterized in that it can inhibit the **influenza** virus-proliferation in the respiratory tract through promoting the secretion of substances capable of inhibiting proteases in the respiratory tract, which induce the **influenza** virus infection, that it can inhibit the **influenza** virus-proliferation in the respiratory tract through promoting the secretion of mucosal immune substances or IgA and IgG and that it can inhibit any release of inflammatory cytokines in the respiratory tract. The present invention also relates to an agent for treating or preventing **influenza** virus-infectious diseases.
ABSTRACT WORD COUNT: 141
NOTE:
Figure number on first page: 0001

LANGUAGE (Publication,Procedural,Application): English; English; Japanese
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200429	238
SPEC A	(English)	200429	8700
Total word count - document A			8938
Total word count - document B			0
Total word count - documents A + B			8938

8/3,AB/14 (Item 5 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01529391
A method for producing **influenza** hemagglutinin multivalent vaccines
Methode fur die Produktion von multivalenten **Influenza** Hamagglutinin Vakzinen
Procede de production de vaccins antigrippaux polyvalents composes d'hemagglutinine
PATENT ASSIGNEE:
MG-PMC, L.L.C., (2245190), Connaught Laboratories, Inc., Route 611, P.O. Box 187, Swiftwater, PA 18370, (US), (Applicant designated States: all)
INVENTOR:
Smith, Gale Eugene, 9 Turnberry Road, Wallingford, CT 06492, (US)
Volvovitz, Franklin, 12 Indian Trail Road, Woodbridge, CT 06525, (US)
Wilkinson, Bethanie E., 25 Joseph Circle, Higganum, CT 06441, (US)
Yoznesensky, Andrei I., 15 Spruce Lane, West Hartford, CT 06107, (US)
Hackett, Craig Stanway, 94 Kondracki Lane, Wallingford, CT 06492, (US)
LEGAL REPRESENTATIVE:
Harding, Charles Thomas (70742), D. Young & Co. 21 New Fetter Lane, London EC4A 1DA, (GB)
PATENT (CC, No, Kind, Date): EP 1275726 A2 030115 (Basic)
EP 1275726 A3 030226
APPLICATION (CC, No, Date): EP 2002076629 950526;

DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
EXTENDED DESIGNATED STATES: LT
RELATED PARENT NUMBER(S) - PN (AN):
EP 833933 (EP 95922133)
INTERNATIONAL PATENT CLASS: C12N-015/86

ABSTRACT EP 1275726 A2
A method of preparing a recombinant **influenza** vaccine using DNA technology is provided. The resulting vaccine is a multivalent, preferably trivalent, **influenza** vaccine based on a mixture of recombinant hemagglutinin antigens cloned from **influenza** viruses having epidemic potential. The recombinant hemagglutinin antigens are full length, uncleaved (HAO), glycoproteins produced from baculovirus expression vectors in cultured insect cells and purified under non-denaturing conditions. In the preferred embodiment, the cloned HA genes are then modified by deletion of the natural hydrophobic signal peptide sequences and replacing them with a new baculovirus chitinase signal peptide. A general approach for the efficient extraction and purification of recombinant HA protein produced in insect cells is also disclosed for the purification of rHA proteins from A sub-types and B type **influenza** viruses.
ABSTRACT WORD COUNT: 127
NOTE:
Figure number on first page: 1

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200303	158
SPEC A	(English)	200303	14050
Total word count - document A			14208
Total word count - document B			0
Total word count - documents A + B			14208

8/3,AB/15 (Item 6 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01446343
Self-assembling polynucleotide delivery system
Selbst zusammenbaubares system zur verabreichung von polynukleotiden
SYSTEME DE LIVRAISON D'UN POLYNUCLEOTIDE A ASSEMBLAGE AUTONOME
PATENT ASSIGNEE:
THE REGENTS OF THE UNIVERSITY OF CALIFORNIA, (221072), 300 Lakeside Drive, 22nd Floor, Oakland, California 94612-3550, (US), (Applicant designated States: all)
INVENTOR:
Szoka, Francis C., Jr., 45 Mendosa Avenue, San Francisco CA 94116, (US)
Haensler, Jean, Aventis Pasteur SA, Campus Merieux, 1541, Avenue Marcel Merieux, 69280 Marcy L'Etoile, (FR)
LEGAL REPRESENTATIVE:
Thiel, Christian, Dr. Dipl.-Chem. (57845), Schneiders & Behrendt Rechts- und Patentanwalte Huestrasse 23 (Westfalenbankgebaude), 44787 Bochum, (DE)

PATENT (CC, No, Kind, Date): EP 1236473 A2 020904 (Basic)
EP 1236473 A3 030115
APPLICATION (CC, No, Date): EP 2002001408 930405;
PRIORITY (CC, No, Date): US 864876 920403; US 913669 920714
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):
EP 636028 (EP 93909508)
INTERNATIONAL PATENT CLASS: A61K-038/02; A61K-047/00; C07F-009/10

ABSTRACT EP 1236473 A2
This invention provides a self-assembling polynucleotide delivery system comprising components aiding in the delivery of the polynucleotide to the desired address which are associated via noncovalent interactions with the polynucleotide. The components of this system include DNA-masking components, cell recognition components, charge-neutralization and membrane-permeabilization components, and subcellular localization components. Specific compounds useful in this system are also provided.
ABSTRACT WORD COUNT: 59
NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200236	188
SPEC A	(English)	200236	12065
Total word count - document A			12253
Total word count - document B			0
Total word count - documents A + B			12253

8/3,AB/16 (Item 7 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01435420
Cellular and serum protein anchors and conjugates
Zell- und Serum-Proteinanker und Konjugate
Proteine serique et cellulaire d'ancrage et conjugues
PATENT ASSIGNEE:
Conjuchem, Inc., (1943478), 225 President-Kennedy, Bureau 3950, Montreal, Quebec H2X 3Y8, (CA), (Applicant designated States: all)
INVENTOR:
Pouletty, Phillipe, 3 O'Dell Place, Atherton, California 94027, (US)
Pouletty, Phillipe, 3 O'Dell Place, Atherton, California 94027, (US)
LEGAL REPRESENTATIVE:
Sutcliffe, Nicholas Robert et al (98861), Mewburn Ellis, York House, 23 Kingsway, London WC2B 6HP, (GB)
PATENT (CC, No, Kind, Date): EP 1216714 A1 020626 (Basic)
APPLICATION (CC, No, Date): EP 2001129699 940916;
PRIORITY (CC, No, Date): US 137821 931015; US 237346 940503
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):

EP 793506 (EP 94930447)
INTERNATIONAL PATENT CLASS: A61K-047/48

ABSTRACT EP 1216714 A1
Novel bifunctional reagents useful in providing extended in vivo lifetimes of physiologically active agents are provided. The reagents comprise conjugates of a first binding member specific for a target in a mammalian host, such as a toxin, drug of abuse, microbe, autoreactive immune cell, infected or tumourous cell, antigen presenting cell, or the like, joined to a second binding member specific for a long-lived blood component, including cells, such as an erythrocyte, platelet or endothelial cell, and plasma proteins. These conjugates find use by extending the lifetime and availability of the target binding member for coupling the target and the blood component and thereby reducing the concentration free target, modulating the volume of distribution of the target, targeting the target to sites of enhanced immune response, facilitating target clearance from the bloodstream, or extending the stimulation of an immunogen.
ABSTRACT WORD COUNT: 140

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200226	343
SPEC A	(English)	200226	12076
Total word count - document A			12419
Total word count - document B			0
Total word count - documents A + B			12419

8/3,AB/17 (Item 8 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01432850
Recombinant vectors for producing HCV envelope proteins
Rekombinante Vektoren zur Herstellung von HCV Hullproteinen
Vecteurs recombinants pour la production de proteines d'enveloppe de HCV
PATENT ASSIGNEE:
Innogenetics N.V., (713148), Industriepark Zwijnaarde 7 Box 4, 9052 Zwijnaarde, (BE), (Applicant designated States: all)
INVENTOR:
Maertens, Geert, Zilversparrenstraat 64, 8310 Brugge, (BE)
Bosman, Fons, Hulst 165, 1745 Opwijk, (BE)
De Martynoff, Guy, Mattotstraat 71, 1410 Waterloo, (BE)
Buyse, Marie-Ange, E. Ronsestraat 23, 9820 Merelbeke, (BE)
LEGAL REPRESENTATIVE:
De Clercq, Ann et al (87754), De Clercq, Brants & Partners, Edgard Gevaertdreef 10a, 9830 Sint-Martens-Latem, (BE)
PATENT (CC, No, Kind, Date): EP 1211315 A1 020605 (Basic)
APPLICATION (CC, No, Date): EP 2002003643 950731;
PRIORITY (CC, No, Date): EP 94870132 940729
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):
EP 721505 (EP 95930434)

INTERNATIONAL PATENT CLASS: C12N-015/40; C12N-005/10; C07K-014/18; A61K-039/29; G01N-033/569

ABSTRACT EP 1211315 A1
The present invention relates to a recombinant vectors encoding an HCV envelope E1 and/or E2 and/or E1/E2 protein encoding sequence. The invention also relates to recombinant nucleic acids comprising said HCV protein encoding sequences. The invention further relates to host cells transformed with said recombinant vectors, as well as recombinant HCV proteins expressed by said host cells and use thereof in diagnostic methods or kits or therapeutic or prophylactic methods of treatment of HCV or HCV vaccine compositions.
ABSTRACT WORD COUNT: 79
NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200223	1905
SPEC A	(English)	200223	23297
Total word count - document A			25202
Total word count - document B			0
Total word count - documents A + B			25202

8/3,AB/18 (Item 9 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01372888
NOVEL COLLECTINS
NEUE COLLECTINE
NOUVELLES COLLECTINES
PATENT ASSIGNEE:
FUSO PHARMACEUTICAL INDUSTRIES LTD., (1209242), 7-10, Doshomachi 1-chome, Chuo-ku, Osaka-shi, Osaka 541-0045, (JP), (Applicant designated States: all)
INVENTOR:
WAKAMIYA, Nobutaka, 1-4, Toko-Gojo 10-chome, Asahikawa-shi, Hokkaido 078-8345, (JP)
KESHI, Hiroyuki, 2-25, Tonotsuji 1-chome Sumiyoshi-ku, Osaka-shi Osaka 558-0042, (JP)
OHTANI, Katsuki, SK Hights B, 2-8 Kamui-Nijo 8-chome, Asahikawa-shi Hokkaido 070-8012, (JP)
SAKAMOTO, Takashi, 1138, Shiba, Sakurai-shi, Nara 633-0074, (JP)
KISHI, Yuichiro, 5-53-4, Fukiya-cho, Wakayama-shi, Wakayama 640-8324, (JP)
LEGAL REPRESENTATIVE:
Webber, Philip Michael et al (83441), Frank B. Dehn & Co., 179 Queen Victoria Street, London EC4V 4EL, (GB)
PATENT (CC, No, Kind, Date): EP 1283214 A1 030212 (Basic)
WO 2001081401 011101
APPLICATION (CC, No, Date): EP 2001922014 010423; WO 2001JP3468 010423
PRIORITY (CC, No, Date): JP 2000120358 000421
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI;

LU; MC; NL; PT; SE; TR
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: C07K-014/47; C12N-015/12; C12P-021/02; A01K-067/027; C07K-016/18; G01N-033/53

ABSTRACT EP 1283214 A1
Provided are isolated collectin (CL-L2s) genes including a base sequence set out in SEQ ID NO: 1, 3, 5, 7, 9, 12, 36, 38 or 40 relating to a novel collectin which are expected to exhibit an antibacterial activity, an antiviral activity and the like particularly in a human body; and isolated collectin proteins including an amino acid sequence set out in SEQ ID NO: 2, 4, 6, 8, 10, 13, 37, 39 or 41 and derivatives and fragments thereof.
ABSTRACT WORD COUNT: 81
NOTE:
Figure number on first page: 0004
LANGUAGE (Publication,Procedural,Application): English; English; Japanese
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200307	2603
SPEC A	(English)	200307	20282
Total word count - document A			22885
Total word count - document B			0
Total word count - documents A + B			22885

8/3,AB/19 (Item 10 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01326443
Cellular and serum protein anchors and conjugates
Zell- und Serum- proteinanker und Konjugate
Proteine serique et cellulaire d'ancrage et conjugues
PATENT ASSIGNEE:
ConjuChem, Inc., (1943475), 1801 de Maisonneuve Blvd, Suite 810, Montreal, Quebec, (CA), (Applicant designated States: all)
INVENTOR:
Pouletty, Philippe, 3 O'Dell Place, Atherton, CA 94027, (US)
Pouletty, Christine, 3 O'Dell Place, Atherton, CA 94027, (US)
LEGAL REPRESENTATIVE:
Walton, Sean Malcolm et al (77071), MEWBURN ELLIS, York House, 23 Kingsway, London WC2B 6HP, (GB)
PATENT (CC, No, Kind, Date): EP 1132097 A2 010912 (Basic)
EP 1132097 A8 011128
EP 1132097 A3 020206
APPLICATION (CC, No, Date): EP 2001107561 940916;
PRIORITY (CC, No, Date): US 137821 931015; US 237346 940503
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED PARENT NUMBER(S) - PN (AN):
EP 793506 (EP 94930447)
INTERNATIONAL PATENT CLASS: A61K-047/48

ABSTRACT EP 1132097 A2
Novel bifunctional reagents useful in providing extended in vivo

lifetimes of physiologically active agents are provided. The reagents comprise conjugates of a first binding member specific for a target in a mammalian host, such as a toxin, drug of abuse, microbe, autoreactive immune cell, infected or tumourous cell, antigen presenting cell, or the like, joined to a second binding member specific for a longlived blood component, including cells, such as an erythrocyte, platelet or endothelial cell, and plasma proteins. These conjugates find use by extending the lifetime and availability of the target binding member for coupling the target and the blood component and thereby reducing the concentration free target, modulating the volume of distribution of the target, targeting the target to sites of enhanced immune response, facilitating target clearance from the bloodstream, or extending the stimulation of an immunogen.
ABSTRACT WORD COUNT: 140

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200137	285
SPEC A	(English)	200137	12074
Total word count - document A			12359
Total word count - document B			0
Total word count - documents A + B			12359

8/3,AB/20 (Item 11 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01322386
Primers for synthesizing full length cDNA clones and their use
Primer zur Synthese von vollstandigen cDNA Klonen und ihre Verwendung
Amorces pour la synthese de cADN de pleine longueur et leur utilisation
PATENT ASSIGNEE:
Helix Research Institute, (2656450), 1532-3 Yana, Kisarazu-shi, Chiba 292-0812, (JP), (Applicant designated States: all)
INVENTOR:
Ota, Toshio, 1-2-7-105, Tsujido Shinmachi, Fujisawa-shi, Kanagawa 251-0042, (JP)
Nishikawa, Tetsuo, 27-3-403, Hikawa-cho, Itabashi-ku, Tokyo 173-0013, (JP)
Isogai, Takao, 511-12, Ohmuro, Ami-machi, Inashiki-gun, Ibaraki 300-0303, (JP)
Hayashi, Koji, 1-9-446, Yushudai Nishi, Ichihara-shi, Chiba 299-0125, (JP)
Ishii, Shizuko, 4508-19-202, Yana, Kisarazu-shi, Chiba 292-0812, (JP)
Kawai, Yuri, 4508-19-201, Yana, Kisarazu-shi, Chiba 292-0812, (JP)
Wakamatsu, Ai, 1473-4-202, Takayanagi, Kisarazu-shi, Chiba 292-0014, (JP)
Sugiyama, Tomoyasu, 2-6-23-102, Kiyomidai, Kisarazu-shi, Chiba 292-0045, (JP)
Nagai, Keiichi, 3-44-14-9-204, Sakuragaoka, Higashiyamato-shi, Tokyo 207-0022, (JP)
Kojima, Shinichi, 2-7-10-202, Gion, Kisarazu-shi, Chiba 292-0052, (JP)
Otsuki, Tetsuji, 3-1-10-B102, Asahi, Kisarazu-shi, Chiba 292-0055, (JP)
Koga, Hisashi, 2-4-15, Asahi, Kisarazu-shi, Chiba 292-0055, (JP)
LEGAL REPRESENTATIVE:

VOSSIUS & PARTNER (100314), Siebertstrasse 4, 81675 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 1130094 A2 010905 (Basic)
EP 1130094 A3 011121
APPLICATION (CC, No, Date): EP 2000114089 000707;
PRIORITY (CC, No, Date): JP 99194486 990708; JP 2000118774 000111; JP 2000183765 000502
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
RELATED DIVISIONAL NUMBER(S) - PN (AN):
(EP 2003025638)
INTERNATIONAL PATENT CLASS: C12N-015/12; C12N-015/11; C12N-015/10; C12N-015/70; C12N-015/85; C12N-005/10; C12N-001/21; C07K-014/47; C07K-016/18; C12Q-001/68

ABSTRACT EP 1130094 A2
Primers for synthesizing full length cDNAs and their use are provided. 830 cDNA encoding a human protein has been isolated and nucleotide sequences of 5'-, and 3'-ends of the cDNA have been determined. Furthermore, primers for synthesizing the full length cDNA have been provided to clarify the function of the protein encoded by the cDNA. The full length cDNA of the present invention containing the translation start site provides information useful for analyzing the functions of the protein.
ABSTRACT WORD COUNT: 79
NOTE:
Figure number on first page: 1

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200136	709
SPEC A	(English)	200136	97667
Total word count - document A			98376
Total word count - document B			0
Total word count - documents A + B			98376

8/3,AB/21 (Item 12 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01322318
Composition comprising membrane virus subviral target and fusion particles and vaccine comprising said composition
Membranvirus Ziel- und Fusion-subvirale Partikel enthaltende Zusammensetzung und diese enthaltende Impstoff
Composition comprenant des particules sous-virales cibles et fusions de virus enveloppes, et vaccin la contenant
PATENT ASSIGNEE:
Deutsches Krebsforschungszentrum Stiftung des offentlichen Rechts, (577160), Im Neuenheimer Feld 280, 69120 Heidelberg, (DE), (Applicant designated States: all)
INVENTOR:
Bosch, Valerie, Dr., Flussgasse 12, 69245 Bammental, (DE)
Sparacio, Sandra, Wasserturmstr. 39, 69214 Eppelheim, (DE)

Zeilfelder, Udo, Lowenstr.1, 68259 Mannheim, (DE)
Pfeiffer, Tanya, Goethestr. 36, 69221 Dossenheim, (DE)
Henzler, Tanya, Kuhler Grund 22, 69126 Heidelberg, (DE)
LEGAL REPRESENTATIVE:
Schussler, Andrea, Dr. (80502), Kanzlei Huber & Schussler Truderinger Strasse 246, 81825 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 1130089 A1 010905 (Basic)
APPLICATION (CC, No, Date): EP 2000103242 000217;
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: C12N-007/04; A61K-039/21; C07K-014/705; C07K-014/715; C07K-014/16

ABSTRACT EP 1130089 A1
Described is a composition of membrane virus subviral particles, preferably retrovirus-like, more preferably HIV-like subparticles, comprising (a) an env-defective, at least one cellular receptor and at least one coreceptor containing membrane virus target particle encoded by an env-defective membrane virus particle encoding vector construct, at least one cellular receptor encoding vector(s) and at least one coreceptor encoding vector(s) and (b) a membrane virus fusion particle encoded by an env-defective membrane virus particle encoding vector construct and an env-encoding vector, wherein said composition of membrane virus subviral particles is capable of inter-membrane virus particle membrane fusion resulting in the formation of membrane-virus particles. Also described is a vaccine comprising the composition of the present invention.
ABSTRACT WORD COUNT: 115
NOTE:
Figure number on first page: 1

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200136	349
SPEC A	(English)	200136	5596
Total word count - document A			5945
Total word count - document B			0
Total word count - documents A + B			5945

8/3,AB/22 (Item 13 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01292075
Production of vaccines
Vakzinproduktion
Production de vaccins
PATENT ASSIGNEE:
Crucell Holland B.V., (3178570), Archimedesweg 4, 2333 CN Leiden, (NL), (Applicant designated States: all)
INVENTOR:
Pau, Maria Grazia, Bargelaan 80, 2333 CW Leiden, (NL)
Uytdehaag, Alphonsus Gerardus Cornelius Maria, Generalperenlaan 20, 3452

EH Vleuten, (NL)
Schouten, Govert Johan, Maria van Hongarijelaan 27, 2353 EM Leiderdorp, (NL)
LEGAL REPRESENTATIVE:
Klein, Bart et al (80366), Crucell Holland B.V., Intellectual Property Department, P.O. Box 2048, 2300 CA Leiden, (NL)
PATENT (CC, No, Kind, Date): EP 1108787 A2 010620 (Basic)
EP 1108787 A3 010829
APPLICATION (CC, No, Date): EP 2000204190 001124;
PRIORITY (CC, No, Date): EP 99203983 991126
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE; TR
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: C12N-015/34; C12N-005/10; C07K-014/11; C07K-014/075; C12N-015/85; C12N-007/02; A61K-039/145

ABSTRACT EP 1108787 A2
Novel means and methods are provided for the production of **mammalian** viruses, comprising infecting a culture of immortalized human **cells** with the virus, incubating the culture infected with virus to propagate the virus under conditions that permit growth of the virus, and to form a virus-containing medium, and removing the virus-containing medium.
The viruses can be harvested and be used for the production of vaccines.
Advantages - human cells of the present invention can be cultured under defined serum free conditions, and the cells show improved capability for propagating virus.
In particular, methods are provided for producing in cultured human cells **Influenza** virus and vaccines derived thereof. This method eliminates the necessity to use whole chicken embryos for the production of **Influenza** vaccines.
The method provides also for the continuous or batchwise removal of culture media. As such, the present invention allows the large scale continuous production of viruses to a high titer.
ABSTRACT WORD COUNT: 154
NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200125	1142
SPEC A	(English)	200125	12523
Total word count - document A			13665
Total word count - document B			0
Total word count - documents A + B			13665

8/3,AB/23 (Item 14 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01270888
NOVEL YEAST VARIANTS AND PROCESS FOR PRODUCING GLYCOPROTEIN CONTAINING MAMMALIAN TYPE SUGAR CHAIN

HEFEVARIANTEN UND VERFAHREN ZUR HERSTELLUNG VON GLYKOPROTEIN ENTHALTENDEN ZUCKERKETTEN VOM SAUGETIERTYP
NOUVELLES VARIANTES DE LEVURE ET PROCEDE DE PRODUCTION DE GLYCOPROTEINE

PATENT ASSIGNEE:
KIRIN BEER KABUSHIKI KAISHA, (579945), 10-1, Shinkawa 2-chome, Chuo-ku, Tokyo 104-8288, (JP), (Applicant designated States: all)
National Institute of Advanced Industrial Science and Technology, (3298251), 3-1, Kasumigaseki 1-chome, Chiyoda-ku, Tokyo 100-8921, (JP), (Applicant designated States: all)
INVENTOR:
Chiba, Yasunori, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Kainuma, Mami, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Takeuchi, Makoto, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Kawashima, Nagako, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Yoshida, Satoshi, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Yamano, Shigeyuki, Kiban Gijutsu Kenkyusho, Kirin Beer K.K., 1-13-5, Fukuura, Kanazawa-ku, Yokohama-shi, Kanagawa 236-0004, (JP)
Jigami, Yoshifumi, 3-24-2 Chuo, Ushiku-shi, Ibaraki 300-1234, (JP)
Ishii, Tomoko, 1055-588, Shimohirooka, Tsukuba-shi, Ibaraki 305-0042, (JP)
Shimma, Yoh-ichi, 1-408-301, Azuma, Tsukuba-shi, Ibaraki 305-0031, (JP)
LEGAL REPRESENTATIVE:
HOFFMANN - EITLE (101511), Patent- und Rechtsanwalte Arabellastrasse 4, 81925 Munchen, (DE)

PATENT (CC, No, Kind, Date): EP 1211310 A1 020605 (Basic)
WO 200114522 010301
APPLICATION (CC, No, Date): EP 2000953436 000816; WO 2000JP5474 000816
PRIORITY (CC, No, Date): JP 99233215 990819
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: C12N-001/19; C12P-021/02; C12N-1:19; C12R-1:865 ; C12P-21:02; C12R-1:865

ABSTRACT EP 1211310 A1
Provided are novel yeast **mutants** capable of producing a glycoprotein in which a sugar chain, having a sugar chain structure identical to that of a sugar chain produced from **mammalian cells**, is attached to an asparagine residue of a protein; and a process for producing the sugar chain and the glycoprotein by a glycoengineering technique using the **mutants**. The newly-bred auxotrophic triple **mutant** and auxotrophic quadruple **mutant** of the present invention can produce a large quantity of high purity neutral sugar chains identical to the high mannose type sugar chains produced from human and other **mammalian cells** and glycoproteins having the neutral sugar chains. Also, introduction of genes for biosynthesis of a mammalian type sugar chain into the **mutants** enables efficient production of a mammalian type sugar chain of high-mannose type, hybrid-type, complex-type, etc. or a protein having the mammalian type sugar chain.
ABSTRACT WORD COUNT: 144

NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; Japanese
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200223	1326
SPEC A	(English)	200223	16186
Total word count - document A			17512
Total word count - document B			0
Total word count - documents A + B			17512

8/3,AB/24 (Item 15 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01218550
INFLUENZA VIRUS HEMAGGLUTININ-BINDING PEPTIDES
SICH AN DAS HAMAGGLUTININ DES **INFLUENZAVIRUS** BINDENDES PEPTID
PEPTIDES SE LIANT A L'HEMAGGLUTININE DU VIRUS DE LA GRIPPE
PATENT ASSIGNEE:
OTSUKA PHARMACEUTICAL CO., LTD., (304161), 9, Kandatsukasa-cho 2-chome, Chiyoda-ku Tokyo 101-8535, (JP), (Applicant designated States: all)
INVENTOR:
SATO, Toshinori, 5-4-5-407, Tsunashima Higashi, Kohoku-ku, Yokohama-shi, Kanagawa 223-0052, (JP)
ISHIKAWA, Dai, 3-1-7-102, Kasuga, Tokushima-shi, Tokushima 770-0002, (JP)
TANAKA, Michinori, 42-13, Chidorigahama, Sumiyoshi, Aizumi-cho, Itano-gun, Tokushima 771-1265, (JP)
OGINO, Koichi, 197-3, Aza Higashihama, Minamihama, Muya-cho, Naruto-shi, Tokushima 772-0003, (JP)
TAKI, Takao, 8-4, Aza Sanomiya, Ejiri, Kitajima-cho, Itano-gun, Tokushima 221-0205, (JP)
LEGAL REPRESENTATIVE:
HOFFMANN - EITLE (101511), Patent- und Rechtsanwalte Arabellastrasse 4, 81925 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 1167382 A1 020102 (Basic)
WO 200059932 001012
APPLICATION (CC, No, Date): EP 2000911385 000327; WO 2000JP1867 000327
PRIORITY (CC, No, Date): JP 9991962 990331
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
INTERNATIONAL PATENT CLASS: C07K-007/08; C07K-016/28; A61K-031/00; A61K-038/00

ABSTRACT EP 1167382 A1
In accordance with this invention there is provided an **influenza** virus hemagglutinin-binding peptide having any of the amino acid sequences defined under SEQ ID NO:1 to NO:11. This peptide binds specifically to the hemagglutinin associated with the first step of **influenza** virus infection to prevent binding of the virus to the host receptor and, as such, finds application as a prophylactic drug for **influenza** virus infection or a therapeutic drug for **influenza**
.
ABSTRACT WORD COUNT: 73

NOTE:
Figure number on first page: NONE

LANGUAGE (Publication,Procedural,Application): English; English; Japanese
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	200201	669
SPEC A	(English)	200201	12440
Total word count - document A			13109
Total word count - document B			0
Total word count - documents A + B			13109

8/3,AB/25 (Item 16 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01014587
P-SELECTIN TRANSLOCATION TO VASCULAR EPITHELIAL LUMEN BY IONIZING RADIATION
P-SELECTIN TRANSLOKATION INS VASKULARE EPITHELIALE LUMEN DURCH IONISIERENDE STRAHLUNG
TRANSLOCATION DE P-SELECTINE DANS LA LUMIERE VASCULAIRE EPITHELIALE PAR RAYONNEMENT IONISANT
PATENT ASSIGNEE:
ARCH DEVELOPMENT CORPORATION, (995433), 1101 East 58th Street, The University of Chicago, Chicago, Illinois 60637, (US), (Proprietor designated states: all)
INVENTOR:
HALLAHAN, Dennis, E., 4214 Estes Road, Nashville, TN 37215, (US)
VIRUDACHALAM, Subbulakshmi, 8757 Bronson Drive, Granite Bay, CA 95746, (US)
LEGAL REPRESENTATIVE:
Gowshall, Jonathan Vallance et al (61531), FORRESTER & BOEHMERT Pettenkoferstrasse 20-22, 80336 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 986401 A1 000322 (Basic)
EP 986401 B1 040225
WO 1998053852 981203
APPLICATION (CC, No, Date): EP 98937941 980529; WO 98US10913 980529
PRIORITY (CC, No, Date): US 48141 P 970530
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
INTERNATIONAL PATENT CLASS: A61K-041/00; A61K-047/48; A61K-048/00; A61K-051/04; A61K-051/06; A61K-051/10
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200409	1583
CLAIMS B	(German)	200409	1602
CLAIMS B	(French)	200409	1861
SPEC B	(English)	200409	49574
Total word count - document A			0
Total word count - document B			54620
Total word count - documents A + B			54620

8/3,AB/26 (Item 17 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00923786
TWO-STEP IMMUNIZATION PROCEDURE AGAINST THE **PYRAMYXOVIRIDAE** FAMILY OF VIRUSES USING ATTENUATED VIRAL STRAINS AND SUBUNIT PROTEIN PREPARATION
IMMUNISIERUNGSVERFAHREN IN ZWEI SCHRITTEN GEGEN **PYRAMYXOVIRIDAE**-VIREN UNTER VERWENDUNG ABGESCHWACHTER VIRALER STAMME UND PREPARATION VON PROTEINUNTEREINHEITEN
PROCEDURE D'IMMUNISATION EN DEUX ETAPES CONTRE LA FAMILLE **PYRAMYXOVIRIDAE** DE VIRUS A L'AIDE DE SOUCHES VIRALES ATTENUEES ET D'UNE PREPARATION PROTEIQUE DE SOUS-UNITES
PATENT ASSIGNEE:
Aventis Pasteur Limited, (3092160), 1755 Steeles Avenue West, Toronto, Ontario M2R 3T4, (CA), (Proprietor designated states: all)
THE REGENTS OF THE UNIVERSITY OF MICHIGAN, (1929031), 3003 S. State Street,, Ann Arbor Mi 48109-8202, (US), (Proprietor designated states: all)
INVENTOR:
KLEIN, Michel, H., 16 Munro Boulevard, Willowdale, Ontario M2P 1B9, (CA)
CATES, George, A., 37 Pemberton Road, Richmond Hill, Ontario L4C 3T5, (CA)
EWASYSHYN, Mary, E., Apartment 1506 120 Torresdale, Willowdale, Ontario M2R 3N7, (CA)
HERLOCHER, M., Louise, 2142 Spruce Way Lane, Ann Arbor, MI 48103, (US)
MAASSAB, H., F., 2446 Shannondale Drive, Ann Arbor, MI 48104, (US)
LEGAL REPRESENTATIVE:
Williams, Richard Andrew Norman et al (77491), Hepworth Lawrence Bryer & Bizley Merlin House Falconry Court Bakers Lane, Epping, Essex CM16 5DQ, (GB)
PATENT (CC, No, Kind, Date): EP 936921 A1 990825 (Basic)
EP 936921 B1 030319
WO 98002180 980122
APPLICATION (CC, No, Date): EP 97930276 970711; WO 97CA499 970711
PRIORITY (CC, No, Date): US 679206 960712
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
EXTENDED DESIGNATED STATES: AL; LT; LV; RO; SI
INTERNATIONAL PATENT CLASS: A61K-039/155
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200312	336
CLAIMS B	(German)	200312	360
CLAIMS B	(French)	200312	354
SPEC B	(English)	200312	5604
Total word count - document A			0
Total word count - document B			6654
Total word count - documents A + B			6654

8/3,AB/27 (Item 18 from file: 348)

DIALOG(R)File 348:EUROPEAN PATENTS

00862554
THERAPEUTIC AND DIAGNOSTIC AGENTS FOR THE TREATMENT OF MICROBIAL INFECTIONS
THERAPEUTISCHE UND DIAGNOSTISCHE AGENZIEN ZUR BEHANDLUNG MIKROBIELLER INFEKTIONEN
AGENTS THERAPEUTIQUES ET DE DIAGNOSTIC POUR TRAITER LES INFECTIONS MICROBIENNES
PATENT ASSIGNEE:
Montana State University, (4352824), 304 Montana Hall, Bozeman, MT 59717, (US), (Proprietor designated states: all)
Ligocyte Pharmaceuticals, Inc., (2984800), 920 Technology Blvd., Suite C., Bozeman, MT 59718, (US), (Proprietor designated states: all)
INVENTOR:
PASCUAL, David, 8220 Indian Paint Brush Drive, Bozeman, MT 59178, (US)
BURRITT, James, 1215 S. Bozeman, Bozeman, MT 59715, (US)
BURGESS, Don, 5553 Black Bear, Bozeman, MT 59715, (US)
GLEE, Pati, 813 W. Villard 75, Bozeman, MT 59718, (US)
JUTILA, John, 516 S. Grand Avenue, Bozeman, MT 59715, (US)
JUTILA, Mark, 3308 Sundance Drive, Bozeman, MT 59715, (US)
BARGATZE, Robert, 1302 Wildflower Way, Bozeman, MT 59715, (US)
PYLE, Barry, 4985 Foster Lane, Bozeman, MT 59175, (US)
CUTLER, Jim, E., 1426 Ash Drive, Bozeman, MT 59715, (US)
HAN, Yongmoon, 306 Treasure Avenue, Bozeman, MT 59715, (US)
LEGAL REPRESENTATIVE:
Gervasi, Gemma, Dr. et al (40515), Notarbartolo & Gervasi S.p.A., Corso di Porta Vittoria, 9, 20122 Milano, (IT)
PATENT (CC, No, Kind, Date): EP 869801 A2 981014 (Basic)
EP 869801 B1 040121
WO 1997018790 970529
APPLICATION (CC, No, Date): EP 96942049 961121; WO 96US18796 961121
PRIORITY (CC, No, Date): US 7477 P 951122
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
INTERNATIONAL PATENT CLASS: A61K-035/12
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200404	1868
CLAIMS B	(German)	200404	1706
CLAIMS B	(French)	200404	2300
SPEC B	(English)	200404	20527
Total word count - document A			0
Total word count - document B			26401
Total word count - documents A + B			26401

8/3,AB/28 (Item 19 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00760018
PURIFIED HEPATITIS C VIRUS ENVELOPE PROTEINS FOR DIAGNOSTIC AND THERAPEUTIC

USE
GEREINIGTE HEPATITIS-C-VIRUS HULLPROTEINE ZUR DIAGNOSTISCHEN UND THERAPEUTISCHEN VERWENDUNG
PROTEINES PURIFIEES D'ENVELOPPE DE VIRUS DE L'HEPATITE C A USAGE DIAGNOSTIC ET THERAPEUTIQUE
PATENT ASSIGNEE:
INNOGENETICS N.V., (713145), Industriepark Zwijnaarde 7, Box 4, 9052 Ghent, (BE), (Proprietor designated states: all)
INVENTOR:
MAERTENS, Geert, Zilversparrenstraat 64, B-8310 Brugge 3, (BE)
BOSMAN, Fons, Hulst 165, B-1745 Opwijk, (BE)
DE MARTYNOFF, Guy, Mattotstraat 71, B-1410 Waterloo, (BE)
BUYSE, Marie-Ange, E. Ronsestraat 23, B-9820 Merelbeke, (BE)
LEGAL REPRESENTATIVE:
De Clercq, Ann et al (87752), De Clercq, Brants & Partners cv., Edgard Gevaertdreef 10a, 9830 Sint-Martens-Latem, (BE)
PATENT (CC, No, Kind, Date): EP 721505 A1 960717 (Basic)
EP 721505 B1 020508
WO 9604385 960215
APPLICATION (CC, No, Date): EP 95930434 950731; WO 95EP3031 950731
PRIORITY (CC, No, Date): EP 94870132 940729
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED DIVISIONAL NUMBER(S) - PN (AN):
(EP 2002003643)
INTERNATIONAL PATENT CLASS: C12N-015/40; C07K-014/18; C07K-016/10; C12Q-001/70; G01N-033/569
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200219	1933
CLAIMS B	(German)	200219	1676
CLAIMS B	(French)	200219	2175
SPEC B	(English)	200219	20483
Total word count - document A			0
Total word count - document B			26267
Total word count - documents A + B			26267

8/3,AB/29 (Item 20 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00656474
-g(a)-1,3-FUCOSYLTRANSFERASE.
-G(A)-1,3-FUCOSYLTRANSFERASE.
-g(a)-1,3-FUCOSYLTRANSFERASE.
PATENT ASSIGNEE:
KYOWA HAKKO KOGYO CO., LTD., (229066), 6-1, Ohtemachi 1-chome, Chiyoda-ku Tokyo 100, (JP), (applicant designated states: DE;FR;GB;IT)
INVENTOR:
SASAKI, Katsutoshi, 1171-3-201, Honmachida, Machida-shi, Tokyo 194, (JP)
KURATA, Kazumi, 3-14-9, Mirokuji, Fujisawa-shi, Kanagawa 251, (JP)
HANAI, Nobuo, 7-9-15, Ohnodai, Sagamihara-shi, Kanagawa 229, (JP)

NISHI, Tatsunari, 39-15, Higashimine-machi, Ohta-ku, Tokyo 145, (JP)
LEGAL REPRESENTATIVE:
Kinzebach, Werner, Dr. et al (6468), Patentanwalte Reitstotter, Kinzebach und Partner Postfach 86 06 49, D-81633 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 643132 A1 950315 (Basic)
EP 643132 A1 990113
WO 9423021 941013
APPLICATION (CC, No, Date): EP 94910547 940328; WO 94JP496 940328
PRIORITY (CC, No, Date): JP 9369016 930329
DESIGNATED STATES: DE; FR; GB; IT
INTERNATIONAL PATENT CLASS: C12N-009/10;

ABSTRACT EP 643132 A1
A novel a-1,3-fucosyltransferase which is expressed by the gene cloned from **animal cells**; a cDNA coding for the transferase; a method of detecting a-1,3-fucosyltransferase using the cDNA and inhibiting the production of the transferase; a recombinant vector containing the cDNA integrated thereinto; a cell containing the vector; and processes for producing the above. The a-1,3-fucosyltransferase invented is useful for producing physiologically active sugar chains, such as sialylated Lewis X, and modifications thereof.
ABSTRACT WORD COUNT: 74

LANGUAGE (Publication,Procedural,Application): English; English; Japanese
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	EPAB95	384
SPEC A	(English)	EPAB95	27443
Total word count - document A			27827
Total word count - document B			0
Total word count - documents A + B			27827

8/3,AB/30 (Item 21 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00620345
ANTI-INFLAMMATORY TOLEROGENIC AND IMMUNOINHIBITING PROPERTIES OF CARBOHYDRATE BINDING-PEPTIDES
ENTZUNDUNGSHEMMENDE TOLEROGENE UND IMMUNOINHIBITORISCHE EIGENSCHAFTEN VON KARBOHYDRATE BINDENDE PEPTIDE
PROPRIETES ANTI-INFLAMMATOIRES, TOLEROGENES ET IMMUNO-INHIBITRICES DE PEPTIDES DE FIXATION D'HYDRATE DE GLUCIDE
PATENT ASSIGNEE:
ALBERTA RESEARCH COUNCIL, (1070134), 250 Karl Clark Road, Edmonton Alberta T6H 5X2, (CA), (Proprietor designated states: all)
INVENTOR:
HEERZE, Louis, D., 10, 10811 86 Avenue, Edmonton, Alberta T6E 2N1, (CA)
ARMSTRONG, Glen, D., 7951 91 Avenue, Edmonton, Alberta T6C 1P9, (CA)
SMITH, Richard, 1010 Buchanan Place, Edmonton, Alberta T6R 2A6, (CA)
LEGAL REPRESENTATIVE:
Nash, David Allan et al (59251), Haseltine Lake & Co., Imperial House, 15-19 Kingsway, London WC2B 6UD, (GB)
PATENT (CC, No, Kind, Date): EP 666758 A1 950816 (Basic)
EP 666758 B1 011212

WO 9407517 940414
APPLICATION (CC, No, Date): EP 93921770 931004; WO 93CA415 931004
PRIORITY (CC, No, Date): US 956043 921002; US 995503 921221
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
INTERNATIONAL PATENT CLASS: A61K-038/02
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200150	1357
CLAIMS B	(German)	200150	1226
CLAIMS B	(French)	200150	1502
SPEC B	(English)	200150	14409
Total word count - document A			0
Total word count - document B			18494
Total word count - documents A + B			18494

8/3,AB/31 (Item 22 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00609715
SELF-ASSEMBLING POLYNUCLEOTIDE DELIVERY SYSTEM COMPRISING AN AMPHIPHATIC CATIONIC PEPTIDE
SELBSTORGANISIERENDES SYSTEM ZUR VERABREICHUNG VON POLYNUKLEOTIDEN ENTHALTEND EIN AMPHIPHATISCHES PEPTID
SYSTEME DE LIVRAISON D'UN POLYNUCLEOTIDE A ASSEMBLAGE AUTONOME COMPRENANT UN PEPTIDE CATIONIQUE AMPHIPHATIQUE
PATENT ASSIGNEE:
THE REGENTS OF THE UNIVERSITY OF CALIFORNIA, (221072), 300 Lakeside Drive, 22nd Floor, Oakland, California 94612-3550, (US), (Proprietor designated states: all)
INVENTOR:
SZOKA, Francis, C., Jr., 45 Mendosa Avenue, San Francisco, CA 94116, (US)
HAENSLER, Jean, 1803 Judah Street, 2, San Francisco, CA 94112, (US)
LEGAL REPRESENTATIVE:
Thiel, Christian, Dr. Dipl.-Chem. (57846), Schneiders & Behrendt Rechts- und Patentanwalte Postfach 10 23 65, 44723 Bochum, (DE)
PATENT (CC, No, Kind, Date): EP 636028 A1 950201 (Basic)
EP 636028 A1 981209
EP 636028 B1 040303
WO 1993019768 931014
APPLICATION (CC, No, Date): EP 93909508 930405; WO 93US3406 930405
PRIORITY (CC, No, Date): US 864876 920403; US 913669 920714
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE
RELATED DIVISIONAL NUMBER(S) - PN (AN):
EP 1236473 (EP 2002001408)
INTERNATIONAL PATENT CLASS: A61K-048/00; A61K-047/42; A61K-038/12
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200410	625
CLAIMS B	(German)	200410	644
CLAIMS B	(French)	200410	733
SPEC B	(English)	200410	11192
Total word count - document A			0
Total word count - document B			13194
Total word count - documents A + B			13194

8/3,AB/32 (Item 23 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00531795
alpha 2-3 Sialyltransferase
Alpha-2-3-Sialyltransferase
Alpha 2-3 Sialyltransferase
PATENT ASSIGNEE:
KYOWA HAKKO KOGYO CO., LTD., (229062), 6-1, Ohtemachi 1-chome, Chiyoda-ku, Tokyo-to, (JP), (applicant designated states: DE;FR;GB;IT)
INVENTOR:
Sasaki, Katsutoshi, 3-6-6, Asahimachi, Machida-shi, Tokyo-to, (JP)
Watanabe, Etsuyo, 1458-28, Okagami, Asao-ku, Kawasaki-shi, Kanagawa-ken, (JP)
Nishi, Tatsunari, 3-9-13, Nakamachi, Machida-shi, Tokyo, (JP)
Sekine, Susumu, 2-20-10, Higashifuchinobe, Sagamihara-shi, Kanagawa-ken, (JP)
Hanai, Nobuo, 3-3-3, Fujimi, Sagamihara-shi, Kanagawa-ken, (JP)
Hasegawa, Mamoru, 1-9-26, Katahira, Asao-ku, Kawasaki-shi, Kanagawa-ken, (JP)
LEGAL REPRESENTATIVE:
VOSSIUS & PARTNER (100311), Postfach 86 07 67, 81634 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 552470 A1 930728 (Basic)
EP 552470 B1 980311
APPLICATION (CC, No, Date): EP 92121482 921217;
PRIORITY (CC, No, Date): JP 91333661 911217; JP 9291044 920410
DESIGNATED STATES: DE; FR; GB; IT
INTERNATIONAL PATENT CLASS: C12N-015/54; C12N-009/10; C12Q-001/68; C12P-021/00; C12N-001/21; C12N-001/21; C12R-001/19

ABSTRACT EP 552470 A1
There are provided a novel a2->3 sialyltransferase expressed by a cloned gene from human cells, a cDNA encoding the a2->3 sialyltransferase, a method for detecting or suppressing the expression of an a2->3 sialyltransferase by use of said cDNA, a recombinant vector containing said cDNA, a cell containing said vector, and their production processes.
ABSTRACT WORD COUNT: 55

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	9811	660
CLAIMS B	(German)	9811	634
CLAIMS B	(French)	9811	768

SPEC B	(English)	9811	21445
Total word count - document A			0
Total word count - document B			23507
Total word count - documents A + B			23507

8/3,AB/33 (Item 24 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00429133
Method and formulation employing type II endoglycosidase
Verfahren und Formulierung unter Verwendung von Endoglycosidase vom Typ II
Methode et formulation employant l'endoglycosidase du type II
PATENT ASSIGNEE:
THE PROCTER & GAMBLE COMPANY, (200173), One Procter & Gamble Plaza, Cincinnati, Ohio 45202, (US), (applicant designated states: AT;BE;CH;DE;DK;ES;FR;GB;GR;IT;LI;LU;NL;SE)
GENENCOR INTERNATIONAL, INC., (1285780), 4 Cambridge Place, 1870 South Winston Road, Rochester, New York 14618, (US), (applicant designated states: AT;BE;CH;DE;DK;ES;FR;GB;GR;IT;LI;LU;NL;SE)
INVENTOR:
Carpenter, Richard Shepard, 10655 Gloria Ave., Cincinnati, Ohio 45231, (US)
Lad, Pushkaraj Jogannath, 814 N. Delaware St., Apt. 310, San Mateo, CA 94401, (US)
Goldstein, Irwin J., 3980 Loch Alpine Dr., Ann Arbor, MI 48103, (US)
Wolff, Ann Margaret, 4570 Boomer Road, Cincinnati, Ohio 45247, (US)
LEGAL REPRESENTATIVE:
Canonici, Jean-Jacques et al (57861), Procter & Gamble European Technical Center N.V. Temselaan 100, 1853 Strombeek-Bever, (BE)
PATENT (CC, No, Kind, Date): EP 425018 A2 910502 (Basic)
EP 425018 A3 911002
EP 425018 B1 961211
APPLICATION (CC, No, Date): EP 90202750 901016;
PRIORITY (CC, No, Date): US 428361 891027
DESIGNATED STATES: AT; BE; CH; DE; DK; ES; FR; GB; GR; IT; LI; LU; NL; SE
INTERNATIONAL PATENT CLASS: C11D-003/386; C11D-003/00; A61K-007/48;

ABSTRACT EP 425018 A2
Methods and formulations for removing glycoside-containing substances from surfaces by treatment with Type II endoglycosidase alone or in combination with other enzymes and/or detergents.
ABSTRACT WORD COUNT: 28

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	EPABF1	950
CLAIMS B	(English)	EPAB96	982
CLAIMS B	(German)	EPAB96	972
CLAIMS B	(French)	EPAB96	1109
SPEC A	(English)	EPABF1	18610
SPEC B	(English)	EPAB96	18501
Total word count - document A			19562
Total word count - document B			21564

Total word count - documents A + B 41126

8/3,AB/34 (Item 25 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00429132
Method employing type II endoglycosidase
Verfahren unter Verwendung von Endoglycosidase vom Typ II
Methode employant l'endoglycosidase du type II
PATENT ASSIGNEE:
THE PROCTER & GAMBLE COMPANY, (200173), One Procter & Gamble Plaza, Cincinnati, Ohio 45202, (US), (applicant designated states: BE;DE;DK;FR;GB;IT;NL)
GENENCOR INTERNATIONAL, INC., (1285784), 4 Cambridge Place, 1870 South Winton Road, Rochester, New York 14618, (US), (applicant designated states: BE;DE;DK;FR;GB;IT;NL)
INVENTOR:
Carpenter, Richard Shepard, 10655 Gloria Ave., Cincinnati, Ohio 45231, (US)
Wolff, Ann Margaret, 4570 Boomer Road, Cincinnati, Ohio 45247, (US)
Lad, Pushkaraj Jogannath, 814 N. Delaware St., Apt. 310, San Mateo, CA 94401, (US)
LEGAL REPRESENTATIVE:
Canonici, Jean-Jacques et al (57861), Procter & Gamble European Technical Center N.V. Temselaan 100, B-1853 Strombeek-Bever, (BE)
PATENT (CC, No, Kind, Date): EP 425017 A2 910502 (Basic)
EP 425017 A3 911002
EP 425017 B1 951220
APPLICATION (CC, No, Date): EP 90202749 901016;
PRIORITY (CC, No, Date): US 428248 891027
DESIGNATED STATES: BE; DE; DK; FR; GB; IT; NL
INTERNATIONAL PATENT CLASS: C11D-003/386; C11D-003/00; A61K-007/48;

ABSTRACT EP 425017 A2
Methods for removing microorganisms, such as bacteria, from surfaces by treatment with Type II endoglycosidase alone or in combination with other enzymes and/or detergents.
ABSTRACT WORD COUNT: 28

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	EPABF1	271
CLAIMS B	(English)	EPAB95	262
CLAIMS B	(German)	EPAB95	270
CLAIMS B	(French)	EPAB95	291
SPEC A	(English)	EPABF1	18293
SPEC B	(English)	EPAB95	18067
Total word count - document A			18566
Total word count - document B			18890
Total word count - documents A + B			37456

8/3,AB/35 (Item 26 from file: 348)

DIALOG(R)File 348:EUROPEAN PATENTS

00429131
Antimicrobial method and formulation employing type II endoglycosidase and antimicrobial agent
Antimikrobielles Verfahren und Formulierung unter Verwendung von Endoglycosidase vom Typ II und antimikrobielles Mittel
Methode antimicrobienne et formulation employant l'endoglycosidase du type II et agent antimicrobien
PATENT ASSIGNEE:
THE PROCTER & GAMBLE COMPANY, (200173), One Procter & Gamble Plaza, Cincinnati, Ohio 45202, (US), (applicant designated states: BE;DE;DK;FR;GB;IT;NL)
GENENCOR INTERNATIONAL, INC., (1285784), 4 Cambridge Place, 1870 South Winton Road, Rochester, New York 14618, (US), (applicant designated states: BE;DE;DK;FR;GB;IT;NL)
INVENTOR:
Carpenter, Richard Shepard, 10655 Gloria Ave., Cincinnati, Ohio 45231, (US)
Wolff, Ann Margaret, 4570 Boomer Road, Cincinnati, Ohio 45247, (US)
Lad, Pushkaraj Jogannath, 203 Falguni Ashoknagar, Kandivali (E) Bombay 400101, (IN)
LEGAL REPRESENTATIVE:
Canonici, Jean-Jacques et al (57861), Procter & Gamble European Technical Center N.V. Temselaan 100, B-1853 Strombeek-Bever, (BE)
PATENT (CC, No, Kind, Date): EP 425016 A2 910502 (Basic)
EP 425016 A3 911002
EP 425016 B1 951220
APPLICATION (CC, No, Date): EP 90202748 901016;
PRIORITY (CC, No, Date): US 428362 891027
DESIGNATED STATES: BE; DE; DK; FR; GB; IT; NL
INTERNATIONAL PATENT CLASS: C11D-003/386; C11D-003/00; A61K-007/48;

ABSTRACT EP 425016 A2
Antimicrobial methods and antimicrobial compositions utilizing Type II endoglycosidase alone or in combination with an antimicrobial agent.
ABSTRACT WORD COUNT: 21

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	EPABF1	922
CLAIMS B	(English)	EPAB95	895
CLAIMS B	(German)	EPAB95	869
CLAIMS B	(French)	EPAB95	1086
SPEC A	(English)	EPABF1	18337
SPEC B	(English)	EPAB95	18116
Total word count - document A			19261
Total word count - document B			20966
Total word count - documents A + B			40227

8/3,AB/36 (Item 27 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00337669
Derivatives of soluble T-4.
Losliche T-4 Derivate.
Derives de T-4 solubles.
PATENT ASSIGNEE:
THE TRUSTEES OF COLUMBIA UNIVERSITY IN THE CITY OF NEW YORK, (477541), West 116th Street and Broadway, New York New York 10027, (US), (applicant designated states: AT;BE;CH;DE;ES;FR;GB;GR;IT;LI;LU;NL;SE)
SMITHKLINE BECKMAN CORPORATION, (201240), P.O. Box 7929 1 Franklin Plaza, Philadelphia Pennsylvania 19101, (US), (applicant designated states: AT;BE;CH;DE;ES;FR;GB;GR;IT;LI;LU;NL;SE)
INVENTOR:
Maddon, Paul J., 60 Haven Ave., New York, New York 10032, (US)
Axel, Richard, 445 Riverside Drive, New York,New York 10027, (US)
Sweet, Raymond W., 108 Edgehill Road, Bala Cynwyd, Pennsylvania 19004, (US)
Arthos, James, 2026 Hill Street, Ann Arbor, Michigan 48104, (US)
LEGAL REPRESENTATIVE:
Lawrence, John et al (60371), Barker, Brettell & Duncan 138 Hagley Road Edgbaston, Birmingham B16 9PW, (GB)
PATENT (CC, No, Kind, Date): EP 330227 A2 890830 (Basic)
EP 330227 A3 910130
APPLICATION (CC, No, Date): EP 89103297 890224;
PRIORITY (CC, No, Date): US 160348 880224
DESIGNATED STATES: AT; BE; CH; DE; ES; FR; GB; GR; IT; LI; LU; NL; SE
INTERNATIONAL PATENT CLASS: A61K-037/02; C12N-015/13; C12N-015/00; C12P-021/02;

ABSTRACT EP 330227 A2
This invention provides a therapeutic agent capable of specifically forming a complex with human immunodeficiency virus envelope glycoprotein which comprises a polypeptide. In one embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in Figure 6 from about +3 to about +185 fused to the amino acid sequence from about +351 to about +369. In another embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in Figure 6 from about +3 to about +106 fused to the amino acid sequence from about +351 to about +369. In yet a further embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in Figure 6 from about +3 to about +185.
This invention also provides a method for treating a subject infected with a human immunodeficiency virus. The method comprises administering to the subject an effective amount of a pharmaceutical composition comprising an effective amount of a therapeutic agent of the invention and a pharmaceutically acceptable carrier.
ABSTRACT WORD COUNT: 182

LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS A	(English)	EPABF1	289
SPEC A	(English)	EPABF1	25033
Total word count - document A			25322
Total word count - document B			0

Total word count - documents A + B 25322

8/3,AB/37 (Item 28 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

00282147
DNA ENCODING THE T CELL SURFACE PROTEIN T4 AND USE OF FRAGMENTS OF T4 IN THE TREATMENT OF AIDS
FUR DAS T-ZELL OBERFLACHENPROTEIN T4 KODIERENDE DNA UND VERWENDUNG VON T4-FRAGMENTEN BEI DER BEHANDLUNG VON AIDS
ADN DE CODAGE DE LA PROTEINE T4 DE LA SURFACE DES CELLULES T ET UTILISATION DE FRAGMENTS DE T4 POUR LE TRAITEMENT DU SIDA
PATENT ASSIGNEE:
THE TRUSTEES OF COLUMBIA UNIVERSITY IN THE CITY OF NEW YORK, (477541), West 116th Street and Broadway, New York, New York 10027, (US), (applicant designated states: AT;BE;CH;DE;FR;GB;IT;LI;LU;NL;SE)
INVENTOR:
MADDON, Paul, J., 60 Haven Avenue, Apt. 25C, New York, NY 10032, (US)
LITTMAN, Dan, R., 367 Liberty Street, San Francisco, CA 94114, (US)
CHESS, Leonard, 81 Greenacres Avenue, Scarsdale, NY 10583, (US)
AXEL, Richard, 445 Riverside Drive, New York, NY 10027, (US)
WEISS, Robin, 25 Cyprus Avenue, Finchley, London N3, (GB)
McDOUGAL, J., Steven, 818 Springdale Road, Atlanta, GA 30306, (US)
LEGAL REPRESENTATIVE:
Henkel, Feiler, Hanzel & Partner (100401), Mohlstrasse 37, D-81675 Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 280710 A1 880907 (Basic)
EP 280710 A1 890503
EP 280710 B1 960320
WO 8801304 880225
APPLICATION (CC, No, Date): EP 87905848 870820; WO 87US2050 870820
PRIORITY (CC, No, Date): US 898587 860821
DESIGNATED STATES: AT; BE; CH; DE; FR; GB; IT; LI; LU; NL; SE
INTERNATIONAL PATENT CLASS: C12Q-001/68; C07H-021/00;
NOTE:
No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): English; English; English
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	EPAB96	2277
CLAIMS B	(German)	EPAB96	1956
CLAIMS B	(French)	EPAB96	2707
SPEC B	(English)	EPAB96	18070
Total word count - document A			0
Total word count - document B			25010
Total word count - documents A + B			25010

8/3,AB/38 (Item 1 from file: 357)
DIALOG(R)File 357:Derwent Biotech Res.

0301645 DBR Accession No.: 2003-03430 PATENT
New **mutant** cell for propagating **influenza** virus with decreased

sialidase activity useful as vaccine, comprises decreased levels of **sialic** acid containing host cell receptors for **influenza** virus - packaging cell culture for **influenza** A virus and **influenza** B virus infection recombinant vaccine, nucleic acid vaccine and gene therapy

AUTHOR: KAWAOKA Y
PATENT ASSIGNEE: WISCONSIN ALUMNI RES FOUND; KAWAOKA Y 2002
PATENT NUMBER: WO 200268632 PATENT DATE: 20020906 WPI ACCESSION NO.: 2002-706991 (200276)
PRIORITY APPLIC. NO.: US 271044 APPLIC. DATE: 20010223
NATIONAL APPLIC. NO.: WO 2002US5455 APPLIC. DATE: 20020222
LANGUAGE: English
ABSTRACT: DERWENT ABSTRACT: NOVELTY - An isolated **mutant** cell (I) comprising decreased levels of **sialic** acid containing host **cell** receptors for **influenza** virus relative to a corresponding **wild-type cell** which supports efficient **influenza** virus replication, is new. DETAILED DESCRIPTION - INDEPENDENT CLAIMS are also included for the following: (1) isolating a cell that has decreased levels of receptors for **influenza** virus, comprising: (a) contacting a population of cells permissive for **influenza** virus replication and sensitive to **lectin** or agglutinin growth inhibition with an amount of **lectin** or agglutinin to yield cells that are resistant to growth inhibition by the **lectin** or agglutinin that specifically binds **sialic** acid; and (b) isolating a **lectin**- or agglutinin-resistant cell having decreased levels of receptors for **influenza** virus; (2) a **lectin**- or agglutinin-resistant cell isolated by method (1); (3) propagating **influenza** viruses having reduced sialidase activity by contacting (I) and the **lectin**- or agglutinin-resistant cell with an amount of an **influenza** virus having reduced sialidase activity to yield progeny virus; (4) a progeny virus obtained by method (3); (5) using a host cell having decreased levels of **sialic** acid containing host cell receptors for **influenza** virus, comprising: (a) contacting (I) and the **lectin**- or agglutinin-resistant **cell** with an amount of an **influenza** virus having **wild**-**type** levels of sialidase activity to yield progeny virus; and (b) serially propagating the progeny virus with (I) and the **lectin** - or agglutinin-resistant cell to yield adapted viruses that efficiently replicate in the **mutant** cell and the **lectin** - or agglutinin-resistant cell; and (6) isolated adapted virus obtained by method (5), which does not have a **mutation** in the hemagglutinin (HA) gene relative to the virus having substantially wild-type levels of sialidase activity. WIDER DISCLOSURE - Eliciting an immune response to an **influenza** virus, which may be prophylactic or therapeutic for an **influenza** virus infection. BIOTECHNOLOGY - Preferred **Cell**: The mutant cell is a mammalian **cell**, particularly **swine**, **bovine**, **simian** or canine **cell**. Alternatively, the mutant **cell** is a **mink** lung **cell**, or an **avian cell**. The **wild-type** **cell** is **MDCK cell**. The mutant **cell** has decreased levels of N-**acetylneuraminic** acid and/or N-**glycolylneuraminic** acid, particularly at least 10-fold lower levels of N-**acetylneuraminic** acid and at least 2-fold lower levels of N-**glycolylneuraminic** acid relative to the corresponding **wild-type cell**. The **lectin**-resistant **cell** is resistant to growth inhibition by Maakia amurensis or Sambucus nigra

lectin . Preferred Method: In isolating a cell that has decreased levels of receptors for **influenza** virus, the **lectin** is Maakia amurensis, Sambucus nigra or Tritrichomonas mobilensis **lectin**. The agglutinin is Limax flavus agglutinin. The **lectin** specifically binds **sialic** acid linked to galactose by alpha(2-3) or alpha(2-6) linkages, or to N-acetylgalactosamine by alpha(2-6) linkages. The method of using a host cell having decreased levels of **sialic** acid containing host cell receptors for **influenza** virus, further comprises isolating the adapted virus. In method (3) or (5), the **influenza** virus is particularly type A or B **influenza** virus. ACTIVITY - Virucide; Immunomodulator. No biological data is given. MECHANISM OF ACTION - Vaccine; Gene therapy. USE - The **mutant** cell is useful in propagating **influenza** virus having reduced or decreased sialidase activity. The obtained virus may be employed in vaccines, in preparing monoclonal or polyclonal antibodies specific for those viruses, in preparing recombinant or reassortant viruses, or for gene delivery including the delivery of immunogenic non-**influenza** virus proteins or peptide for vaccines or therapeutic proteins. ADMINISTRATION - The dosage of attenuated virus may range from 103-107 plaque-forming units (PFU)/kg. The inactivated vaccine can be given at a dose of 0.1-200 microg HA protein. Administration is by subcutaneous, intravenous, intradermal, intramuscular, intraperitoneal, intranasal, oral or transdermal routes. EXAMPLE - No relevant examples given.(33 pages)

? log y

06dec04 11:00:01 User219783 Session D2066.3